SECTION C



PERFORMANCE WORK STATEMENT (PWS)

for

AIRCRAFT & GROUND FUEL SERVICES

and

FUEL/CRYOGENIC STORAGE AND DISTRIBUTION

under

SOLICITATION SP0600-04-R-0103

NAVAL AIR STATION
PATUXENT RIVER20878-5409

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Notes

Words, phrases, references, and notations highlighted in medium blue and underlined are hypertext or links to the area of the PWS or files being referenced. Simply point to and click (left mouse button) to jump to that area or referenced. For instance, point to and click on Table 1. Hours of Operation, to quickly get to and view that table. To return to your original point (here), click on the aqua blue "back" arrow, the arrow pointing to the edge of the screen, at the upper left corner of the page screen. Note that the hypertext turns a medium violet once it has been used; however, it can be use as often as needed. It will return to medium blue once you save the file and reboot your computer.

If applicable, words, phrases, and sections highlighted in red refer to outlying (NALF and OLF) fields. Delete such references if not applicable.

If applicable, words, phrases, and sections that may be highlighted in skyblue refer to cryogenic operations. Delete such references if not applicable.

Sections highlighted in yellow represent equipment, components, and issues that may or may not be applicable, required, or desirable to the specified location but are included for review. Delete or modify such references as applicable.

C-1.0 GENERAL

C-1.1 Description

C-1.1.1 Responsibilities: This Performance Work Statement (PWS) is established to identify the responsibilities of the Alongside Aircraft Refueling Contractor (AARC), hereafter referred to as the Contractor, to manage, maintain, and operate Government owned fuel and cryogenic facilities and equipment as outlined herein at Naval Air Station (NAS) Patuxent River (Trapnell Field), MD, hereafter be referred to as NAS Patuxent River, and supported activity, Naval Surface Weapons Center (NSWC), Dahlgren, VA, hereafter be referred to as NSWC Dahlgren. Furthermore, this PWS establishes the Contractor's responsibility to furnish, manage, maintain, and operate mobile fuel servicing equipment required and necessary to support the facilities, equipment, vehicles, and aircraft assigned to and as may transit, deploy to, or exercise from NAS Patuxent River.

Note

All figures, tables of figures, and data regarding the receipt, movement, issue, measurement, and inventory of products, to include cryogenics products, are stated in US Gallons. Some tank capacities may be rounded to the nearest thousand gallons.

C-1.1.2 Facilities, General: The NAS Patuxent River bulk fuel facility is a widespread system of tanks and components interconnected by pipeline and operated by a workforce consisting of civil service and military personnel. The Contractor interface with these systems is to receive products, jet fuels, AVGAS, and ground fuel, from a series of driver operated fillstands. However, two fuel systems, the service station and the single tank VQ-4 direct fueling system, are operated by the Contractor workforce. Other Contractor workspaces consist of the Contractor administrative, personnel and refueler maintenance Bldg. 2622, the adjacent refueler parking area, and the Cryogenics facility Bldg. 502. Other than a Government furnished fuel servicing truck, there are no fuel facilities at NSWC Dahlgren.

C-1.2 Mission

- C-1.2.1 Mission Support Functions: NAS Patuxent River serves as the Navy's principal research, development, test, evaluation, engineering and fleet support activity for naval aircraft, engines, avionics, aircraft support systems and ship/shore/air operations. The base also hosts the Navy Test Pilot School, and both NAS Patuxent River and the nearby NOLF Webster host Unmanned Aerial Vehicle operations. An additional mission is the support of VQ-4 (TACAMO) Detachment. In support of these varied missions, the Contractor shall be responsible for the following fuels and cryogenic management functions.
 - ✓ Fuel services (issue and defuel) of aviation fuels to aircraft, ground support equipment, and facilities using mobile refueler and/or fixed direct refueling/pantograph systems
 - ✓ Fuel services (issue and defuel) of ground fuel products via mobile fuel servicing truck
 - ✓ The testing of, collection (defuel) by truck, intermediate handling, and disposal as directed of Used Oil (fuel)
 - ✓ The operation of the manned automated service station
 - ✓ Limited product quality surveillance, i.e., sampling, visual examination of products, the forwarding of sample requiring further test to the Government fuel laboratory
 - ✓ Fuel accounting and administrative functions limited to automated and manual collection of data and the download of such data to the Government accounting system and the submission of service station and truck inventory reports
 - ✓ The receipt, to include sampling and submission of samples for analysis, storage, handling, and issue of cryogenic products (LOX and LN2) and gases
 - ✓ All associated inspections, preventive maintenance (PM), and operator maintenance applicable to the Contractor managed service station and cryogenic systems and documentation of all inspections, PM, maintenance, and repair actions. These actions may include the installation, administration, and upkeep of an automated preventive maintenance program and other software as may be specified herein.
- C-1.2.2 Mission Support Responsibility: The limited receipt and internal handling of products as outlined herein and the delivery of petroleum and cryogenic products to units assigned to or as may transit, deploy to, or take part in exercises at NAS Patuxent River shall be the responsibility of the Contractors.

C-1.3 Contract Performance

- C-1.3.1 Performance: The Contractor shall perform the tasks identified herein and achieve the performance standards outlined for each task. The Contractor shall, as outlined in Section C-1.4, Detailed Plans, submit plans that demonstrate its capability to meet all performance standards and comply with all applicable Federal, state, and local laws, DOD policy, instructions and regulations, and NAS Patuxent River instructions and guidelines. Except as specified herein, the Contractor shall be responsible for obtaining computer access to or obtaining copies of all Federal and state laws, regulations, codes, and commercial/civil guidelines, including changes thereto, that are required and necessary to the performance of this contract. As noted in Appendix D, Reference Documents, the contracted activity will provide a single copy of applicable DOD, Service, and local instructions, and changes thereto required under this contract.
- **C-1.3.2 Drug Free Workplace**: The Contractor shall establish and maintain a Workplace Drug Testing Program that is in compliance with the Mandatory Guidelines for Federal Workplace Drug Testing Programs as outlined by Executive Order 12564 of September 15, 1986 and Section 503 of Publication 100-71, 5 USC Section 7301 note, the Supplemental Appropriation Act for fiscal year 1987 date dated 11 July 1987.
- **C-1.3.3 Surveys**: In addition to the documentation generated under <u>Appendix F, Quality Surveillance Program</u>, the Government may perform customer satisfaction surveys, which may be used as part of the assessment of contract performance. The COR has the option to increase the frequency of surveys to address contract compliance issues as needed.

C-1.4 Detailed Plans

- **C-1.4.1 General**: The Contractor shall submit detailed plans to the Government for review and acceptance. The required plans library shall address the full range of fuel and cryogenic management and operations issues applicable to the contracted functions at NAS Patuxent River. On acceptance, all plans shall be incorporated into the contract; however, each plan is a dynamic document that may require review and updating over the course of the contract.
- **C-1.4.1.1 Plans Submission:** As specified by <u>Clause L2.31, Proposal Format and Content (Navy) (DESC January 2004)</u>, summary plans shall be submitted for review with the technical evaluation package. The **bold italics** sentence of each of the following plan requirement statements specifies when the complete plan is due to the Government and to whom it will be submitted. For those plans not required until after the contract start date, the Contractor shall comply with existing Government practices and procedures during the initial performance period.
- **C-1.4.1.2 Plans Library**: Once the entire required plans set is compete, the Contractor shall provide a copy of the plans library on Compact Disc (CD-R) in Adobe Portable Document File (pdf) format to the contracted activity COR, NOLSC Petroleum Code N423B, and the DESC-FBP contracting specialist responsible for contract administration.
- **C-1.4.1.3 Required Plans**: Eleven (11) specific plans are required.
- C-1.4.1.3.1 Contract Compliance Plan: Pursuit to the provisions of <u>Clause E5.03</u>, <u>Inspection of Services Fixed Price (August 1996)</u>, the Contractor shall provide a comprehensive and detailed plan that will ensure contract compliance. The plan, the application of an internal, self-inspection system acceptable to the Government, shall addresses methods for meeting the performance standards established by the contract. *The complete Contract Compliance Plan shall be submitted to the contracted activity within 60 days of the contract start date*.
- C-1.4.1.3.2 Product Quality Surveillance Plan: A comprehensive plan to ensure that products placed in the care of the Contractor are properly handled, remain on-specification, and are ready for issue. The plan shall include policy and procedure regarding product sampling, visual examination of samples, and the submission of sample needing further analysis to the Government fuel laboratory. In addition, the plan shall outline the limited documentation of samples and test results, reports and records keeping applicable, and actions to be taken in case of unacceptable test results. The plan shall fully outline Contractor responsibilities for quality surveillance under this contract. The complete Product Quality Surveillance Plan shall be submitted to the contracted activity within 60 days of contract start up.

- **C-1.4.1.3.3** Environmental Protection Plan: As outlined in Section C-2.15, Environmental Protection, the Contractor shall submit a comprehensive and detailed plan outlining policy, procedures, and safeguards necessary to protect the environment. All applicable DOD and USN regulations and Federal, state and local laws apply. The complete Environmental Protection Plan shall be submitted to the contracted activity within 60 days of contract start date.
- C-1.4.1.3.4 Contract Contingency Plan: The Contract Contingency Plan shall outline Contractor actions to ensure there are no significant interruption of services resulting from labor disputes, catastrophic failure of equipment, or the effects of natural disasters/emergencies. The plan shall provide specific details regarding labor issues as may result from potential strike actions, military contingency and war time manning requirements, subcontracting as may be required to meet emergent manning requirements, and the replacement of equipment anticipated to be out of service for more than 72 hours. The Contractor shall be responsible for repairing or replacing inoperable equipment or obtaining additional equipment and manpower required to carry out day-to-day and contingency operations. Upgrading or modifying equipment to meet specific off station and public, over-the-road requirements, licensing or obtaining permits for equipment and the licensing of personnel to operate on public roads, and the adherence to all insurance requirements shall be the responsibility of the Contractor. The complete Contract Contingency Plan shall be submitted to the contracted activity within 60 days of contract start up.
- C-1.4.1.3.5 Maintenance Plan: Provided Government property under the conditions outlined in <u>Clause 1114</u>, <u>Government Property (Fixed-Price Contracts) (May 2004)</u> and the maintenance requirements of <u>Section C-2.12</u>, <u>Preventive Maintenance Facilities and Equipment</u>, the Contractor shall, within the limits of the maintenance requirements established, publish a plan for the use, maintenance, repair, protection, and preservation of the property identified herein. The <u>Maintenance Plan</u>, to include the installation and use of a Contractor furnished automated preventive maintenance program, shall clearly outline the procedures for planning, programming, accomplishing, documenting, and reporting all maintenance actions. Maintenance as may be directed under <u>Section C-4.2</u>, <u>Services Requiring a Task Order</u>, shall also be covered. The <u>Maintenance Plan</u>, a dynamic document, will be continuously reviewed over the course of the contract and any need for change communicated to the Contractor through the Contracting Officer. Any Contractor provided/installed PM software shall become Government property on termination of the contract. All PM reports, listings, and records generated will become Government property at the time they are generated. *The complete Maintenance Plan*, to include a copy of all maintenance action forms, listings and reports to be generated by the computer based preventive maintenance program, shall be submitted to the contracted activity within 60 days of contract start up.
- C-1.4.1.3.6 Operations and Staffing Plan: The Operations and Staffing Plan is a comprehensive and detailed matrix that outlines all manning aspects, to include sub-contracting, and requirements regarding the management and labor force to undertake the tasks specified herein. The plan shall include a detailed organization chart showing the number of employees identified by wage determination, job classification, and full/part time employee status, a brief description of the tasks to be performed, and the duty description; see Section C-1.9, Qualifications, of the employee that will perform the task described. The complete Operations and Staffing Plan, the final of which is mutually agreed to during the technical evaluation process and outlined in the final revised offer, shall be submitted to the contracted activity within 60 days after contract award.
- C-1.4.1.3.7 Inventory Control and Accountability Plan: A comprehensive and detailed plan to ensure Contractor compliance with the inventory, accounting, and reporting requirements of <u>DOD 4140.25M</u>, <u>DOD Management of Bulk Petroleum Products</u>, <u>Natural Gas</u>, <u>and Coal</u>, Navy instructions and regulations, and local policy as may be applicable to the contracted activity shall be written and published. Contractor performance with regard to the hand held scanner system (FUELS) as outlined in <u>Section C-2.9</u>, <u>Inventory</u>, <u>Accounting</u>, <u>and Administration</u>, shall also be covered. <u>The complete Inventory Control and Accountability Plan shall be submitted to the contracted activity within 60 days of the start of the contract</u>.
- C-1.4.1.3.8 Fuel and Cryogenics Safety Plan: As reflected in Section C-2.1, Safety Program, the contractor shall provide a detailed plan outlining the fuel and cryogenic systems applicable to the contracted location, product handling characteristic, and the policy, procedures, and actions necessary to maintain a safe working environment. The plan, a compendium of references, local laws, and regulations applicable to the products stored and handled, Material Safety Data Sheets, and guidelines regarding the safe handling of such products shall be maintained and updated over the course of the contract. The complete Fuel and Cryogenics Safety Plan shall be submitted to the contracted activity within 60 days of contract start up.

- C-1.4.1.3.9 Security Plan: A detailed Security Plan as called for in Section C 2.16, Security, shall clearly identify Contractor responsibilities for maintaining the security of Government facilities, equipment, data processing computer systems, and materials, as well as any Contractor furnished equipment, tools, and materials. The complete Security Plan shall be submitted to the contracted activity within 60 days after contract start up.
- **C-1.4.1.3.10 Training Plan**: The Contractor shall publish a comprehensive plan outlining training and objectives as set forth in Section C-2.13, Training and Records Keeping. The plan shall list course and subject titles of materials to be used, a brief description of the subject, identify training sources, establish the frequency of training, and detail the method of monitoring plan compliance. Training required by state and local governments, i.e., Marine Terminal Operator, shall also be included. *The complete Training Plan shall be provided to the contracted activity at contract start up.*
- C-1.4.1.3.11 Equipment Provisioning Plan: As outline in Section C-3.0, Contractor Furnished Equipment, the contractor shall provide the types and quantities of vehicles necessary to support the locations identified under this contract. In addition, other major equipment items, i.e., powered grounds maintenance equipment, computers system, and office machines, shall be identified and included in a Equipment Provisioning Plan. The complete plan (list), the final of which is mutually agreed to during the technical evaluation process and outlined in the final revised offer, shall be submitted to the contracted activity within 60 days after contract award.

C-1.5 Contract Turnover

- **C-1.5.1** Access: In the event of a Contractor change/turnover, the successor contractor shall be granted access to the base and all contracted facilities and equipment to survey all such those facilities and equipment and observe operations necessary to the drafting of the detailed plans required under Section C-1.4, Detailed Plans. During the last two weeks of the expiring contract, the outgoing Contractor shall permit personnel of the successor Contractor access to all contracted facilities to observe ongoing operations, position and prepare equipment, and to brief and train new personnel for a smooth transition.
- **C-1.5.2 Assistance**: During the last 72 hours of the expiring contract, the successor Contractor shall be provided assistance by the outgoing Contractor and the COR in accomplishing a joint facility and equipment turnover inspection. The inspection shall provide for a facilities walk-through and property inventory (validation/update of <u>Appendixes A, Government Furnished Facilities</u> and <u>Appendix B, Government Furnished Equipment, Supplies, and Services</u>), product sampling and testing, and a complete product inventory.

C-1.6 Planning Information

- **C-1.6.1 Workload**: Based on the workload data reflected by the various tables and exhibits of this PWS, the Contractor should plan to issue approximately *1,157,000 gallons* of JP5, JP8, and 100LL fuel to some *1,285 aircraft* per month at NAS Patuxent River; however, surges of *1,433,000 gallons* to as many as *1,718 aircraft* have occured. Defuel workload factors are outlined in the Exhibit of Defuel Activities. The Contractor should also plan to undertake, as outlined herein, ground fuel delivery, and used oil collection/disposal as defined by and within the time frames established by <u>Table 1</u>, Hours of Operation.
- **C-1.6.2 Information**: Workload information for specific fuel services, i.e., the movement and issue of products, limited quality surveillance, in submission of accounting data, and other workload factors, are quantified to the extent practical in the various sub-sections of Section C-2.0, Specific Tasks. The various exhibits to this PWS provide a more detailed view of product receipts and issues, and fuel services by truck and direct refueling systems, as may be applicable, in terms of total services by day and month, and average daily workload data. However, unforeseen workloads such as increased airframe testing or contingency support of any type are not quantified. The data outlined herein and the attached exhibits are historic information provided to serve as the planning baseline for the fuel and cryogenics services functions. Based on this historic information coupled with real time flight operations schedules, aircraft/squadron deployments, exercise and training schedules, and air show/public exhibit schedules provided by the base, the Contractor shall be fully responsible for adjusting levels of and providing personnel and equipment to meet workload demands for day-to-day flight operations, exercises, air show/public exhibits, and other real time workload variances that may affect fuel services operations. As an aid to the Contractor, the contracted activity will, to the extent possible and practical, provide daily flight schedules, exercise/deployment schedules, identify all known and scheduled events the contractor will be responsible for supporting, and provide the Contractor schedules, correspondence, and message traffic regarding all such events.

- **C-1.6.2.1 Air Show AVGAS Services**: NAS Patuxent River may, on occasion, sponsor an air show. Given the air show dates and base/COR tasking as outlined in <u>Section C-4.2</u>, <u>Services requiring a Task Order</u>, the contractor shall, by whatever means deemed most cost effective to the Navy, plan for and support all AVGAS requirements. The Contractor shall provide the equipment outlined in <u>Section C-3.1.3</u>, <u>Refuelers</u> and the manning necessary to the support of the air show. Contractor manpower costs applicable to this tasking shall be included in CLIN 0001.
- C-1.6.3 Outlook: Discussions with Fuels Management regarding the current and future mission of NAS Patuxent River revealed the potential mid-contract deployment of the Strike Fighter (as many and six or seven airframe) and some expansion of the VQ-4 direct refueling system. This outlook does not however preclude fundamental changes in mission, flight-training schedules, and assignment of units as may be undertaken by the Department of Defense, the Navy, or other agencies that may be tasked to operated from NAS Patuxent River. The Contractor will be notified as the requirement for long-term changes are made known and contract adjustments are deemed necessary and appropriate.

C-1.7 Operating Hours

C-1.7.1 Contractor Coverage: As published in the National Geospatial-Intelligence Agency (NGA) Flight Information Supplement (FLIP), airfield operating hours for NAS Patuxent River are 0700 to 2300 (no days of the week specified). The airfield is normally closed on Federal holidays; however, local aircraft maintenance activities, test programs, and VQ-4 schedules requiring fuel services may be undertaken anytime. As a rule, Table 1, Hours of Operation, establishes fuel services operating hours that meet or exceed the published airfield-operating window. The Contractor shall provide immediate and continuous fuel support services within the response time established in Section C-2.2.2.2, Response, for the hours specified in Table 1, Hours of Operation; however, the Contractor shall be fully capable of responding to the demand for all fuel and cryogenic support and services anytime, 24 hours per day, year-round, including holidays.

NOTE

As used above, "shall be fully capable of," should not be construed to mean or imply a requirement for full time staffing outside the hours specified in <u>Table 1, Hours of Operation</u>. See <u>Section C-2.2.2.2.1, After Hours Response.</u>

- C-1.7.2 **Labor Categories**: Offers shall include all labor costs associated with all specified operations in the price for the appropriate Contract Line Item Number (CLIN) as outlined in the request for proposal. Work that is considered outside of normal operating hours, i.e., the servicing of aircraft outside the hours specified the <u>Table 1</u>, <u>Hours of Operation</u> and deemed necessary by the local command or real time contingencies, will be reimbursable as outlined in <u>Section C-4.3</u>, <u>Augmentation</u>. The Government will reimburse the contractor only for approved augmentation worked by "service personnel," as described in <u>Section C-1.9.2</u>, <u>Service Personnel</u>. Essential personnel as listed in <u>Section C-1.9.1</u>, <u>Essential Personnel</u>, are a part of the Contractor's Management Team and shall not be considered to be "service personnel" as defined by <u>Section I</u>, <u>Clause 1100</u>, <u>Service Contract Act of 1965</u>.
- C-1.7.3 Hours of Operation: The following is a table of the petroleum and cryogenic functions for which the Contractor shall be responsible. Unless tasked by authorized authority to perform outside the times specified, see Section C-4.3.2, Augmentation Authority, the table clearly outlines the days of the week and the specific time of the day each function shall be manned with fully qualified personnel and capable of accomplishing the work applicable or monitoring other work parties, e.g., other contractors, and/or performing common operator tasks necessary to assist other persons or parties that may be tasked to survey, inspect, monitor, adjust, refurbish, repair, or replace the equipment, systems, or facilities applicable to a function. Tasks commonly associated with a given function, tank truck receipts at bulk storage for example, or rendering the aforementioned assistance, will normally be accomplished within the hours specified. Empty cells indicate that a function is not normally manned for the day(s) indicated by the column heading.

NOTE

The following table defines the days of the week and the specific hours of operation for which the Contractor shall be responsible for providing immediate support/services. The table does not dictate or account for preoperations equipment inspections, quality surveillance, or maintenance required to render equipment and systems serviceable, nor does it dictate the level of manning required to undertake the level of support required.

Table 1 Hours of Operation

Hours of Operation (by function)					
Function (1)	Monday-Friday	Saturday	Sunday/Holidays		
Site Manager (CSM)		Duties as Required			
Assistant Site Manager (ASM)		Duties as Required			
Fuels Accounting (FTS)	0730-1600				
Fuel Dispatch Center (3) (DIS)	0700-2300				
Aircraft Fuel Servicing Operations (2)(4) (DSO)	As Follows	As Follows	As Follows		
Truck (Cold) Refueling Operations (DSO)	0000-2400	0000-2400	0000-2400		
Direct Refueling Operations, VQ-4 (2) (FDSO DSO)	0000-2400	0000-2400	0000-2400		
Ground Fuel Delivery (5) (DSO)	0700-1530				
Used Oil (<u>DSO</u>)	0730-1600				
Service Station Operations (7) (FDSO)	0730-1600 2200-2300	0800-1000 1700-1800 2200-2300	0800-1000 1700-1800 2200-2300		
Cryogenic Storage and Distribution (CSO)	0700-1530				
NSWC Dahlgren, VA	As required (8)				

- (1) The entry following the functional description is the code for the employee/worker that would normally fill the position applicable to that function. See Section C-1.9.1, Essential Personnel, and Section C-1.9.2, Service Personnel. An indented line of activity indicates it is or may be a sub or collateral duty of the preceding line. The specific time segments, i.e., Ground Fuel Delivery, Monday-Friday, 0700-1530, are provided for basic planning purposes only. These specific time spans should not be construed to mean or imply that the function is undertaken only for the specified time indicated. As noted in Section C-1.7.1, Contract Coverage, "the Contractor shall be fully capable of responding to demands for "all" fuel and cryogenic support and services "anytime," 24 hours per day, year-round."
- (2) To include the manning as may be required to perform all inventory reconciliation, and associated administrative tasks relevant to end-of-month/fiscal-year inventories that fall on a Saturday, Sunday, or a holiday. See <u>Section C-2.16</u>, <u>Security</u>, regarding security clearances and access to Government computer systems.
- (3) Driver/system operators (D/SO) assigned to night shifts and weekend work periods for which there is no dispatcher assigned, shall maintain manual dispatch logs of fuel services rendered.
- (4) Includes any and all fixed (direct fueling system) and mobile (truck) hot refueling via pantograph and hose set, and cold refueling/defueling of aircraft assigned to and as may transit, deploy to, or exercise from the contracted activity. Also includes the servicing of facilities and equipment as may be requested by authorized customers. Personnel assigned may include drivers, system operators, a mechanic, and other skilled personnel required and necessary to satisfy aircraft fuel servicing demands and other collateral duties identified herein.
- (5) Ground fuel delivery, to include all grades of automotive gasoline, diesel fuel, heating oil, and jet fuel used in lieu of diesel, as well as Used Oil collection and disposal operations, may be a collateral duty to the driver/operators that provide aircraft fuel-servicing support. Ground fuel operations may include scheduled deliveries to outlying equipment sites and fields. Also see Section C-2.4.3, Alternate Issues, Method, and Manning, regarding alternate ground fuel (service station) support operations.
- (6) To include the manning as may be required to conduct end-of-month/fiscal-year inventories that fall on a Saturday, Sunday, or a holiday. If applicable, also includes manning for extended pipeline/barge receipt operations. See the <u>Exhibit of Product Receipts</u> to determine the number of pipeline/barge receipt operation per year.
- (7) An automated but manned service station open only for the hours noted. to the extent necessary to undertake system inspections, perform PM and inventories, and to receive products; however, see Section C-2.4.3, Alternate Issues, Method,, and Manning regarding alternate ground fuel (service station) support operations.
- (8) NSWC Dahlgren, 40 miles west of NAS Patuxent River on US Route 301. Fuel services are required for scheduled special projects of varying duration. Driver/Operators shall be directed to duty site to meet project servicing schedules which will be provided to the Contractor as soon as practical and/or possible.

C-1.8 Staffing

C-1.8.1 General: The Contractor shall provide the management and supervisory staff and labor to accomplish the petroleum and cryogenic receipt, storage, product handling, and issue operations, and related tasks identified in Section C-2.0, Specific Tasks. The Contractor's staffing shall be flexible and fully capable of meeting the demands of multiple aircraft servicing operations via mobile refuelers, direct refueling system, and/or a combination of both to provide for the refueling services outlined. Furthermore, the Contractor shall staff to undertake all required accounting, service station and cryogenics, limited quality surveillance, and other related services, e.g., random special project support at NSWC Dahlgren, as may be outlined herein.

- **C-1.8.1.1 Knowledge and Skills**: The Contractor shall ensure that personnel assigned to all tasks have the requisite knowledge and skills to meet the performance standards for those tasks and comply with all applicable Federal and state laws, regulations, and code. All employees shall be able to read and understand English (be literate) to the extent they can understand and follow oral instructions/directions, read and understand instructions, directives, regulations, and operating procedures, detailed written orders, and training materials, and be capable of writing in English to compose reports that convey complete thoughts. All employees shall be capable of performing basic numeric operations (addition, subtraction, multiplication, and division) and the use of numbers as they relate to ledgers, logs, and forms, meters, gauges, and measuring devises such as tapes, thermometers, hydrometers, and other instruments as may be used during the receipt, handling, inventory and issue of petroleum and cryogenic products.
- C-1.8.1.2 Employment Standards: All employees or persons who may be hired to represent, perform on behalf of, or work under the management of the Alongside Aircraft Refueling Contractor (AARC) shall comply with all Federal, DOD, Navy/USMC, and station/base regulations, instructions, guidelines, and policy regarding employment at and entry to NAS Patuxent River. The Contractor shall be responsible for keeping abreast of and ensuring employee adherence to DOD and base regulations and policy relevant to the presents of employees on station and shall ensure that all such persons meet the requirements of employment and conform to the rules regarding, but not necessarily limited to, security, clearance, and identification policy, vehicle registration and operation of a POV on station, medial assistance, the use of the exchange and military facilities, and other local rules, guidance, or prohibitions that may apply to their entrance to and activity or employment on station. Additionally, unless compensated equal to the current Joint Travel Regulation (JTR) rate for POV mileage, employees shall not be tasked to or required to use their privately owned vehicle (POV) to travel between work sites. However, employees shall not be tasked, required, or allowed to use their privately owned vehicle (POV) to transport hazardous materials such as fuel samples or sampling equipment between work sites.

C-1.9 Qualifications

C-1.9.1 Essential Personnel

- **C-1.9.1.1** General: Essential personnel, the corporate executive officer, the on-site manager, and the on-site assistant manager shall have the education, training, background/experience, and skills required and necessary to make fiscal and management decisions, direct personnel, and work with individuals at all levels of corporate management as well as civil and military command.
- **C-1.9.1.2 Resumes**: As outlined in <u>Section L, Instructions, Conditions, and Notices to Offers or Quotes, Clause <u>L2.31</u>, a resume shall be submitted for essential personnel, the Corporate Executive Officer, the Site Manger, and the Assistant Site Manager (full or part time).</u>
- **C-1.9.1.3 Corporate Executive Officer (CEO)**: To assure continuity between the contracted location/activity and corporate office, the Contractor shall employ an executive who, for the duration of the contract, can make fiscal, management, and administrative decisions concerning this contract. He/she shall have a complete understanding of the terms and conditions of this contract and should be knowledgeable of the management, operation, and maintenance of fixed and mobile fuel systems to the extent outline herein.
- **C-1.9.1.4 Contract Site Manager (CSM)**: The Contractor shall employ an experienced site manager. His/her experience shall be relevant to the facilities installed and equipment assigned to the contracted activity and shall include:
 - ✓ The management, operation, and maintenance of bulk fuel storage and distribution systems/facilities
 - ✓ The management, operation, and maintenance of mobile (aviation and ground) fuel servicing equipment
 - ✓ The management, operation, and maintenance of direct aviation fuel servicing equipment and facilities
 - ✓ The management, operation, and maintenance of service station (manual/automated) facilities
 - ✓ The quality surveillance of aviation and ground fuel products and support applicable to the contracted activity
 - ✓ Aviation and ground fuel inventory, accounting, and administration principles and practices
 - ✓ Practical experience in the basic design and layout of petroleum facilities, component makeup and flow characteristics of fuel storage and distribution, and the ability to read and understand basic drawings, blueprints, and system specifications

He/she shall have had a minimum of three (3) years of experience in petroleum storage and distribution operations, airfield petroleum services, and fuel systems maintenance. One year shall have been supervisory experience gained within the five (5) year period immediately prior to the latter of the contract start date or the individuals hiring date. That experience shall be documented supervisory experience and training in operations noted above with emphasis in equipment inspections, operations, maintenance, inventory management, and environmental compliance.

- **C-1.9.1.4.1 Cryogenics Management**: To the extent the cryogenic function is outlined herein, the site manager shall have a working knowledge of cryogenic operations. He/she shall be knowledgeable of receipts from commercial sources, storage operations, issues to carts, converters, and other equipment as may be assigned to the contracted activity, system/equipment maintenance at the level required under this PWS, and quality surveillance to the extent that he/she is able to effectively supervise cryogenic personnel and operators.
- **C-1.9.1.4.2 Collateral Duties**: Other than those administrative duties commonly associated with and carried out by an individual in a management position, the site manager shall not have collateral duties nor shall the position be a collateral duty.
- **C-1.9.1.5 Assistant Site Manager (ASM)**: The Contractor shall employ an assistant site manager. The individual employed shall have a minimum of two years experiences in petroleum services operations. One year must be supervisory experience gained within five years immediately prior to the proposed hiring date. That experience must be specialized supervisory experience in bulk storage and mobile fuel servicing with emphasis on operations, equipment maintenance, and environmental compliance.
- **C-1.9.1.5.1 Collateral Duties**: The assistant site manager may have collateral duties such as a FDSO or driver <u>but not that of a dispatcher</u>; however, the position shall not be a collateral duty. Assistant managers elevated to the manager position, short or long term, shall meet the collateral duty restrictions applicable to the manager position.
- **C-1.9.1.6 Replacement of Essential Personnel**: In the event it becomes necessary to replace any essential person, the Contractor shall, within 5 work days, notify the Government in writing (e mail acceptable) as to the final work day or termination date of the outgoing person and a plan outlining specific dates/time frames for the hiring of the replacement person, or a resume of a proposed candidate that supports the experience requirements noted above. All proposed replacement personnel shall have qualifications that are equal to or greater than the qualifications of the person being replaced.

C-1.9.2 Service Personnel

- C-1.9.2.1 General: The personnel/position descriptions sited within this section are those deemed necessarily to staff the fuel and cryogenic functions applicable to NAS Patuxent River and its outlying activities. They are statements regarding skills that are required to satisfy specific labor needs for the functions outlined in Table 1, Hours of Operation. Included in each skill category header line is the Department of Labor, Wage and Hour, classification applicable to this contract and the skills required. Personnel shall be classified according to the position, job, or function at which they will perform the majority of their duties. These personnel/position descriptions do not necessarily differentiate between supervisory personnel and skilled labor but assume the Contractor will establish the appropriate management, supervisory, and operator/laborer structure best suited to the contracted activity. Also see Section L, Instructions, Conditions, and Notices to Offers or Quoters, Clause L2.31 regarding the identification of labor categories, skills, conformance of skills, collateral duties, and workforce structure. Manning as outlined in the Contractor's final accepted offer and incorporated in the contract, shall establish the PWS/contract staffing levels.
- **C-1.9.2.1.1 Conformance**: In the event there is no wage determination listing for a class of services employee required, cryogenic operators or full time service station attendants for example, the Contractor shall submit a request to conform to a specific wage determination category to the DESC Contracting Officer with or prior to the submission of the initial offer. All such conformance issues shall be resolve prior to the submission of the final revised offer.

C-1.9.2.1.2 Skills and Licenses: The tasks outlined herein may require employees to have or obtain special or specific skills, training, certifications, permits, or licenses to operate specialized equipment, a forklift, pier crane, or an ABO analyzer for instance. The Contractor is fully responsible for evaluating facility, equipment, and task requirements and providing fully qualified personnel with the appropriate, licenses, permits, credentials, or training certificates required to identify the person assigned as qualified to accomplish the tasks assigned in accordance with all applicable DOD, USN and USMC, Federal, state, and local laws and regulations. Training certificates may be presented in lieu of a license if no commercial equivalent license, i.e., forklift operator or cryogenic systems operator, exists. The Government reserves the right to request and review the records of persons assigned to sensitive and technical positions and functions within the fuel and cryogenic management arena.

Note

NAVFAC P-300, Management of Civil Engineering Support Equipment specifically forbids the issuance of OF-346 (US Government Motor Vehicle Operator's Identification Card) or NAVFAC Form 11260/2 (Construction Equipment Operator's License) to contract personnel.

Note

For the purposes of this PWS, the term "fuel servicing operations" shall be construed to include the handling of fuel products such as but not necessarily limited to turbine (jet) fuels, aviation gasoline, automotive gasoline, diesel fuel, heating oils, turbine fuels used in lieu of diesel fuel, turbine and reciprocating engine oils, used oil/fuels, recyclable jet fuel, and oily water.

- C-1.9.2.3 Dispatcher (DIS): Each Fuel Management dispatcher shall be a qualified Drivers/System Operator and have at least one year experience in aircraft refueling operations, and shall be knowledgeable of radio communications, instructions/regulations pertaining to fueling and defueling of Government and civilian aircraft, and Government forms used to document aircraft fuel servicing. He/she must demonstrate familiarity with the layout of the base and outlying fields as well as the airfield and aircraft parking areas and restrictions applicable to servicing aircraft within those areas. Individuals acting as dispatchers shall be capable of to communicate in English, both orally and in writing. Except for those limited administrative and accounting duties outlined within this PWS, dispatchers shall not have collateral duties.
- **C-1.9.2.3.1 Facilities Response Plan (FRP)**: Duty dispatchers shall also be knowledgeable of emergency notification procedures and serve as the Fuel Management initial point of contact in response to fuel spills within, caused by, or relevant to operations that are the responsibility of the Fuel Department.
- C-1.9.2.4 Driver/System Operator (DSO): Driver/system operators shall be qualified to perform fuel servicing operations (refuel/defuel operations) by mobile fuel servicing equipment/trucks, truck supplied pantograph and hoses sets, and fixed direct fuel servicing systems (hydrants). Driver/system operators shall pass a Contractor administered base and flightline familiarization test, practical equipment/facility competency tests, and shall be certified, by the Contractor, as qualified. The individuals training records shall be updated prior to the unsupervised operation of any fuel servicing equipment. The Contractor shall re-certify personnel annually or as requested by the COR. Operators shall be familiar with safety regulations applicable to aviation and ground fuel servicing operations on and around the airfield and supported activities and shall demonstrate a practical knowledge of and ability to inspection and maintain fuel servicing equipment and systems. Drivers/system operators may be required to make basic input to the Fuels Automated System (FAS) or maintain dispatch logs.

- **C-1.9.2.4.1 Limits of Duties**: The term "system (direct refueling or pit) operator" refers to a qualified fuel truck/system operator, a person who has been specifically trained to operate and control the equipment that make up the direct refueling system or the refueler and pantograph in the case of a truck/pantograph system, and the person designated to operate the deadman controls of the refueling system during fueling evolutions. Unless specifically tasked herein, the contractor shall not be responsible for the manning the fire watch, nozzle operator, or refueling coordinator (plane captain) positions. The unit receiving services will be responsibility for providing all manning other than that of the fuel system or pit operator. Should the Contractor be tasked to provide other direct fueling system or hot pit crewmembers; see Section C-1.9.2.5, Aircraft Servicer.
- C-1.9.2.4.2 Licensing: All drivers shall be licensed in accordance with the vehicle operating laws, regulations, and code for the state Maryland, shall process a valid Maryland Commercial Drivers License with the appropriate tank truck and HAZMAT endorsements, and shall be/remain in compliance with all such requirements for the duration of their employment under this contract. The Contractor shall ensure that drivers required to operate vehicles and equipment on public roads are licensed for the class of vehicle to be operated on such public roads. Driver records appropriate to the class of license an employee holds, i.e., individual Department of Motor Vehicle (DMV) driving record, and a current record of physical examination or certification shall be maintained by the Contractor and made available for review by the Government on request. The Contractor shall ensure that all drivers' records are kept current for the term of the contract.
- **C-1.9.2.4.3 Hours of Service of Drivers**: The Contractor shall not schedule drivers to work in excess of the rules established by 49 CFR Part 395, Hours of Service of Drivers.
- C-1.9.2.5 Aircraft Servicer (ACS): Reserved.
- C-1.9.2.6 Motor Vehicle Mechanic (MVM): A Motor Vehicle Mechanic shall be qualified and capable of performing truck chassis and drivetrain, cargo tank, fuel pump/filter system, and component diagnostics, adjustments, maintenance, and repair of contractor owned and operated fuel servicing equipment. He/she shall be skilled and fully capable of performing tasks ranging from major component removal, repair, and replacement to systems diagnostics using state-of-the-art tools and measuring devices, or capable of accurately communicating maintenance requirement to third party persons who may be tasked to perform such work. He/she and shall be computer literate to the extent that he/she is capable of understanding, making input to, and extracting information from automated diagnostic equipment and shop maintenance and status systems such as FAS.
- **C-1.9.2.7 Fuel Distribution Systems Operator (FDSO)**: FDS operators shall be qualified to receive, handle, and issue petroleum products, to include used oils, and complete the inventory, limited accounting, and administrative functions related thereto. He/she shall have practical experience in all facets of fuel distribution systems to include, pipeline systems, storage tanks, pumps, valves, fuel monitors and filters, truck fillstands, used oil storage and disposal facilities, and service station facilities (manual and automated). He/she shall be able to convert gauge and temperature readings to quantities of products and shall be able to perform quality assurance functions. He/she shall be able to correlate pressures, temperatures, and quantities as read from various gauges and meters normally found at a fuel facility. Operators shall have a basic understanding of written description and instructions pertaining to facility operations, shall be able to implement cyclic maintenance programs and safety programs relating to all aspects of facility operation and shall have demonstrated expertise in spill cleanup procedures, prevention and control measures, related equipment operation and maintenance. Operators shall have experience in inspecting trucks and other modes of conveyance and be capable of various types of petroleum sampling of storage tanks, trucks, fillstands, etc. Hazardous waste handlers shall be "certified" as required by Federal, State or local laws and Navy/base regulations as applicable.
- **C-1.9.2.8 Fuel Distribution System Mechanic (FDSM)**: The Fuel Distribution System Mechanic shall have a minimum of five (5) years experience and be qualified to operate, inspect, maintain, and repair fuel distribution systems, i.e., fuel storage tanks and pipeline systems, direct refueling systems, service stations, and the mechanical, electrical, and computer connected/driven components thereof. He or she shall be capable of detecting and correcting system component malfunctions, misalignments, leaks, and other adjustment issues and performing scheduled and unscheduled fuel system maintenance. The FDSM shall be capable of removing, repairing and replacing major system components, have a basic knowledge of automatic tank components and gauging systems, high/low level alarms, cathodic protection, and oily water waste systems. The FDSM shall also be capable of performing all the duties of the FDSO.

C-1.9.2.9 Fuel Laboratory Technician (FLT): Reserved.

C-1.9.2.10 Cryogenics Supervisor/Operator (CSO): Cryogenic supervisors/operators shall be fully knowledgeable of cryogenic products, the storage and distribution systems applicable to the contracted activity, and Navy policy as outlined in the most current version of OPNAVINST 4790.2, *The Naval Aviation Maintenance Program (NAMP)*, and references sited therein. Cryogenic system operators shall have a minimum of two (2) years experience as is evident by documented military specialty training or the documented commercial equivalent, in the receipt, storage, and issue of cryogenic products (LOX/LN2), inspection and operator maintenance of cryogenics equipment, the servicing of portable servicing carts, liquid to gas converters, and other systems as may be applicable the contracted activity. Operators shall be thoroughly familiar with Aviation Breathing Oxygen (ABO), tools, safety procedures, quality requirements, regulations, and directives. Cryogenic system supervisory personnel shall have a minimum of five (5) years of experience that is documented as noted above, and shall have supervised a cryogenics facility and personnel for at least one (1) year within the past five (5) years.

NOTE

Cryogenic operators/supervisors shall not be a collateral duty nor shall they be assigned collateral duties. See <u>Section C-2.8.1.1, Restrictions</u>.

C-1.9.2.10.1 Licensing: Cryogenic system operators/supervisors required to services support equipment (SE) assigned to the activity and identified by OPNAVINST 4790.2, *The Naval Aviation Maintenance Program (NAMP)*, shall be certified and licensed as outlined therein. The local Maintenance Officer (MO) will provide all training and certifications, and license personnel as required.

C-1.9.2.10.2 ABO Quality Surveillance: Contract personnel assigned shall draw delivery samples and transport those samples to the RDT&E Laboratory at Bldg. 1403. See Section C-2.8.1.3, Quality Surveillance.

C-1.9.2.11 Fuel Supply Technician (FTS): The Fuel Supply Technician (SCA Directory of Occupations code 01400) shall be fully knowledgeable of manual and automated fuel management and accounting systems such as the Fuels Automated System (FAS), FAS Enterprise Server (FES), and the Supply computer systems applicable to the processing of fuel and cryogenic management accounting data.

C-1.9.2.11.1 Qualifications: The Fuel Supply Technician shall possess sufficient computer skills to use client/server applications in a Microsoft Windows environment. Those skills shall include the ability to logon; shutdown; initiate modems; manipulate files; send and receive email; and to use web browsers to send and receive information. The use Microsoft standard office products such as Word, Excel, and PowerPoint; other commercial off the shelf applications, utilities; and custom software in such a manner that daily fuel supply operations are effectively and efficiently conducted may also be required. Those skills shall include the use of the real time information systems, the manipulation data within the Fuel Manager system and the related fuel management modules and status systems.

C-1.9.2.11.2 Security: See <u>Section C-2.26</u>, <u>Security</u>, regarding security clearances.

C-1.10 Reserve Training

C-1.10.1 Space/Training Obligations: The Government reserves the right to enter and occupy contracted Government facilities and to use Government owned facilities, systems, equipment, and materials to conduct Naval Reserve training and to meet real time military operational requirements. Full cooperation in the joint use of all Government owned facilities, systems, equipment, and materials is expected; however, under normal peacetime operating conditions or conditions as may be specified herein, the Contractor is not obligated to relinquish control of facilities, systems, equipment, and materials required to fulfill its contractual obligations and commitments, provide training services to Reserve personnel, or provide access to or use of contractor owned equipment.

C-1.10.2 Training Commitment: None

C-1.10.3 Training Schedules: To the extent possible and practical, the Government will provide advanced notification of reserve training schedules to the Contractor.

C-1.11 Correspondence and Visits

C-1.11.1 Notification: The Contractor shall notify the COR of any and all visits or notice of intent to visit contract management, its employees, or the contracted facilities by any federal, state, local government, base (military) office/agency, union representative, or contract corporate officers. Except for that considered to be company or proprietary documents, the Contractor shall provide the COR copies of all correspondence resulting from such visits.

C-1.12 Information and Records Management

C-1.12.1 General: Documents held or generated by the Contractor may take the form of personnel files, i.e., individual driver and training records, proprietary company records and reports such as internal monthly management reports, and Government information and accounting files such as inventory reports or transaction documents generated in response to this contract. With the exception of that correspondence considered proprietary company records, all correspondence, records, to include Contractor's owned equipment history records, files, reports, and documents, manual or automated, generated by or provided to and maintained by the Contractor shall be open and readily available to Government inspection, review, and audit for the duration of the contract and any subsequent and contiguous contract periods. On termination of the contract, all of the aforementioned records except personnel driver and training records, Contractor's owned equipment history records, and proprietary company management records shall be turned over to the Government.

C-2.0 SPECIFIC TASKS (FIRM FIXED PRICE)

C-2.1 Tasks and Services

C-2.1.1 General: The following sections define the specific aviation fuel, ground fuel, and cryogenic tasks and duties to be performed and services to be provided by the Contractor. Corresponding duties, i.e., quality surveillance, maintenance, inventory, administration, training, and janitorial services, for which the Contractor may be responsible and tasked, are also outlined. The various tasks, services, and duties are defined, outlined, and cross-referenced with regard to other tasks, hours of operation, contractor equipment requirements, as well as Government furnished equipment, facility, and service information. The Contractor shall be fully responsible for performing the tasks and duties outlined and providing the services specified.

C-2.2 Fuel Servicing Operations

C-2.2.1 Functions: Fuels servicing operations in support of aviation activities, special projects, and aircraft assigned to and as may transit, deploy to, or exercise from NAS Patuxent River and supported activity NSWC Dahlgren are defined as those fuel functions directly involved in the delivery of fuel products to aircraft and support equipment. Those functions are the **Fuel Dispatch Center**, responsible for direct contact with customers and the control of fuel servicing equipment and personnel, and **Aircraft Refueling**, the section responsible for providing qualified personnel and equipment to transport and issue (refuel/defuel) products by mobile fuel servicing equipment and fixed direct refueling systems.

C-2.2.1.1 Fuel Dispatch Center

C-2.2.1.2 Staffing: The Contractor shall staff the fuel management dispatch center, the focal point of the fuel management function, for the days/hours listed in <u>Table 1, Hours of Operation</u>. A dispatcher shall be qualified as outlined in <u>Section C-1.9.2.3</u>, <u>Dispatcher (DIS)</u>.

C-2.2.1.3 Dispatch Control: Aviation fuel is issued to station and transient aircraft by mobile fuel servicing equipment and fixed direct refueling systems. Defuels, the return of product to the fuels management, are accomplished by truck. In addition, ground fuels, and used oil services are requested by organization throughout the base. Requests for all such services shall be taken by and processed by the fuel dispatch center. Based on the specific request, equipment and personnel shall be dispatched and controlled as needed to satisfy the request received. All requests for fuel services shall be recorded, monitored, and historical records kept using manual dispatch logs

C-2.2.1.4 Documentation: The fuel dispatch center/dispatchers shall perform basic fuels accounting and administration functions such as collecting and reviewing fuel receipt, issue, and inventory documents. The dispatcher shall ensure all documents are legible and accurate, shall ready all documents, pass down logs, and management reports for submission to the fuel accounting office by 0800 Monday, or the first duty day of the week, through Friday. Weekend/holiday documents shall be submitted the next duty day following the weekend or holiday.

Requirement. The focal point of the Fuel Management that receives and records requests for fuel services and captures data relevant to the Fuel Division workload. Dispatches and maintains control of personnel and equipment to meet the demand for fuel services within the established response times. Performs basic accounting and reviews documentation for legibility and accuracy, maintains control of documentation, prepare reports relevant to the Fuel Management workload, and submits a complete documentation package to the fuel accounting office. Advises the Government of any circumstance that may result in the inability to perform the required services in a timely manner.

> Performance Standards

- ✓ Qualified dispatch personnel on duty for the days/hours specified in Table 1, Hours of Operation
- ✓ Dispatcher(s) one hundred per cent accurate in processing and recording requests for fuel services (aviation, ground, and used oil)
- ✓ For each request for services, fully qualified personnel dispatched to arrive at the requesting location with the established response time
- ✓ Dispatcher maintains full control of fuel servicing equipment and duty personnel
- ✓ No support/operational delays in excess of standard response time the result of contractor negligence or misconduct
- ✓ Dispatch pass down logs and management reports prepared at submitted

- ✓ Scanners delivered to the Government accounting office for data download by 0800 hour daily, Monday, or the first duty day of the week, through Friday
- ✓ Historical records and backup files maintained

C-2.2.2 Aviation Fuel Servicing Operations

- **C-2.2.2.1 General**: Aviation fuel servicing operations are defined as the delivery, or receipt by defuel, of aviation fuel products to aircraft and support equipment by mobile fuel servicing vehicles, fixed direct refueling systems, or a combination thereof. Guidance, policy, and procedures regarding the performance of all such fuel servicing operations are outlined in <u>NAVAIR 00-80T-109</u>, <u>Aircraft Refueling NATOPS Manual</u>. The Contractor shall be responsible for performing all aviation fuel-servicing operations and safeguarding facilities, equipment, and fuel products under its control during normal and adverse conditions.
- C-2.2.2.2 **Response**: As outlined in Section C-1.7, Operating Hours, the Contractor shall be capable of providing fuel services to station and transient aircraft 24 hours a day, year around, including holidays (24/7/365). During the hours specified in Table 1, Hours of Operation, each request for fuel services shall result in the dispatch of a fuel servicing truck/operator to the aircraft identified by the requester so that each truck/operator dispatched arrives at the aircraft specified by the work request, within 20 minutes as measured from the time the request for service is received by the dispatch center to the time the operator physically arrives at the aircraft to be serviced. If a request for services is for multiple aircraft, the Contractor shall respond to service the first aircraft identified within the 20 minute response time and continue to service all subsequent aircraft in the order prioritized by the requestor until all fuel servicing requirements for the specified request are meet. However, note that the multiple aircraft response rule does not preclude the requestor from requesting more than one fuel service truck/operator. The response to or scheduling of direct refueling operations shall be such that the operator are physically present on site at the time the aircraft to be serviced arrives at the designated refueling pit. Driver and operators shall not interrupt the flow of work, i.e., service aircraft to which they are not directed, without approval by the dispatch center, nor shall they interrupt servicing operations for rest or meal breaks without proper relief or explicit approval of the fuel dispatch center. On arriving at an aircraft, operators shall take all steps and precautions necessary to service the aircraft in accordance with NAVAIR 00-80T-109, Aircraft Refueling NATOPS Manual, USN regulations, and station instructions applicable to fuel servicing operations. Service response times in excess of the 20 minute response window shall be fully and accurately recorded and explained in the dispatch pass down log and management reports reflected in Section C-2.2.1.4, Documentation.
- **C-2.2.2.2.1 After Hour Response**: The Contactor shall establish an after hours notification mechanism, a means of being contacted in the event emergent services are required. Requests for any/all services outside of the operating hours specified within the above, shall be meet within *two* (2) *hours* as measured from the time the Contractor is notifies to the time the contract operator is in position to perform the service required. See Section C-4.3, Augmentation regarding reimbursement for after hour support.
- **C-2.2.2.3 Equipment**: Contractor and Government furnished fuel servicing equipment as described below shall be maintained and operated by the Contractor.
- C-2.2.2.3.1 Mobile Fuel Servicing Equipment: The Contractor shall provide the aviation fuel servicing equipment as specified in Sections C-3.1, Vehicles, in sufficient numbers to undertake the workload outlined in the Exhibit of Products Issued and the Exhibit and Defuel Activities. The Contractor shall fully maintain all furnished trucks, tractors, equipment cargo tanks, refueling/defueling systems, and components thereof in a safe, serviceable, ready for dispatch condition. Equipment inspections and product sampling and visual analysis and the periodic Type "C" product analysis performed by the Government, shall be completed and documented on the vehicle inspection form prior to the initial dispatch of the equipment for the duty day. The Government furnished fuel servicing truck assigned to NSWC Dahlgren shall be inspected and functionally check by the Contractor.
- **C-2.2.2.3.1.1 Off Station Operations**: Aviation fuel deliveries over public roads to off station locations shall be accomplished using equipment that is configured and licensed/permitted for use on public roads. All Federal, state, and local inspections, licensing or permits, and insurance requirements for the equipment used, shall be a responsibility of the Contractor. Furthermore, the contractor shall ensure that cargo quantities and vehicle weights are adjusted so as to meet the all Federal, state, and local highway laws, regulations, and code for traveling over public roads. Operators shall be licensed as set forth in Section C-1.9.2.4.1, Licensing.

- C-2.2.2.3.2 Direct Fuel Servicing Equipment: Government furnished equipment consisting of the 30,000-gallon day tank and direct refueling system as described in Appendix A, Government Furnished Facilities, shall be inspect, maintained to the extent outlined in Section C-2.11, Property Management and Maintenance, and operated by the Contractor. Equipment/system inspections and product sampling and visual analysis and the periodic Type "C" product analysis performed by the Government, shall be completed and documented on the system inspection forms prior to the initial use of the equipment for the duty day.
- C-2.2.2.3.3 **Jet Fuel Services Data**: The data reflected by Exhibit of Products Issued, is historical for NAS Patuxent River. It provides detailed information in terms of months and years of fuel services. Other workload exhibits provide average workload data in terms of truck movements and pit services applicable NAS Patuxent River. Table 2, Squadrons and Aircraft Assigned, is a breakdown of squadrons/aircraft currently assigned to NAS Patuxent River and provides a local picture of the services required on a day-to-day basis. The Contractor shall keep this table, as well as the home station aircraft database in FAS, current.

Table 2 Squadrons and Aircraft Assigned (1)

Aircraft Assigned					
Squadron/Unit (1)	Type Aircraft (1)	Number Assigned (1)	Max. Fuel Load (2)	Average Refuel (3)	
Force *	Various	28		Various	
Test Pilot School (TPS) *	Various	51		Various	
Strike *	F18/F14	35	1,919/2,919	1000/1200	
R/W *	Helicopters	33		400/500	
NRL *	Р3	7	9,200	4000/5000	
VX-1 *	Various	17		Various	
E/F Program *	F18	9	1,919	1000	
VQ-4 *	E6B/T45	8/5	/443	8000/13000	

⁽¹⁾ Data extracted from FAS Home Station Aircraft Database

Requirement: Respond to requests for aircraft, equipment, and facility fuel services so as to provide quality product in a timely manner to authorized customers. Tasked personnel and equipment meet the demand for services within the established response times. Receive and review documentation for legibility and accuracy, maintains control of all documentation, prepare reports and FAS summaries relevant to the Fuel Management workload, and submits a complete documentation package to the fuel accounting office in a timely manner. The Contractor shall notify the Government of any circumstance that may result in the inability to perform the required services in a timely manner.

> Performance Standards

- ✓ Mobile/fixed equipment inspected and sampled by prior to first use of the duty day. Inspection and applicable laboratory documents available
- ✓ Response to requests for fuel services within the established perimeters. No servicing delays the result of Contractor negligence or misconduct
- ✓ Driver's knowledgeable of and use appropriate radio etiquette
- ✓ Operators adhere to operational safety rules, i.e., flightline vehicle operations, grounding and bonding, safety distance criteria, fire watch, and other safety guidelines
- ✓ Issues/defuel/truck fill documents one hundred percent accurate. Documents complete and legible
- ✓ No fuel spills due to Contractor negligence or misconduct

⁽²⁾ See Military Handbook 844 (AS) or airframe specific NATOPS manuals

⁽³⁾ Based on historical data, the average quantity of product issued in a single refueling on a day-to-day basis

^(*) An asterisk following any squadron/unit designation indicates an independent maintenance activity authorized to request services from the Fuel Dispatch Center. See Section C-2.2.2, Response, regarding the response time applicable to a request for fuel services. The Contract may be responsible for the simultaneous responds to any/all of the squadrons/units designated within the response parameters established.

C-2.3 Bulk Storage Operations

C-2.3.1 General: Bulk storage operations are defined as the receipt, storage and handling, and issue of fuel products at the primary fuel storage facility. It also provides for of quality surveillance, system maintenance, and product accounting functions, the details of which are covered under other sections of this PWS. The Contractor shall be responsible for performing bulk fuel operations, i.e., gauging, system inspections and preventive maintenance, sampling, system alignment, documentation of tasks and actions taken, and system monitoring required and necessary to conduct all storage related actions and safeguarding fuel supplies under its control during normal and adverse conditions.

C-2.3.2 Product Storage

- **C-2.3.2.1 Facilities**: The facilities identified within this section are those that comprise the VQ-4 direct refueling system. Tankage and components for which the Contractor is responsible for but outside this area, the service station for instance, are covered in their respective sections. NAS Patuxent River VQ-4 storage, a ready issue facility, consists of a single 30,000-gallon jet fuel tank, the appropriate receipt/issue filter system, pumps, and piping connecting it to a single pantograph. It is a self contained system connected to the Government operated bulk storage facility by pipeline. See Appendix A, Government Furnished Facilities, for a detailed breakdown of these facilities.
- **C-2.3.2.2 Staffing**: The Contractor shall provide the necessary staffing to undertake and document daily and cyclical inspections, to manipulate components to receive and issue product, to monitor the system, and to perform preventive and operator maintenance on the facility. In addition, the Contractor shall be capable of performing all other functions relative to an active storage operation, i.e., inventory, quality limited to the visual analysis of samples take, housekeeping, the securing of the system, and environmental protection as outlined here and elsewhere within this PWS.

C-2.3.3 Bulk Product Receipts

- **C-2.3.3.1 Receipts**: Jet fuel is received at single tank by pipeline connected to the NAS Patuxent River bulk storage facility. The Contractor shall be responsible for all work, i.e., gauging, system inspections, sampling, system alignment, documentation, and system monitoring required and necessary to conduct all receipt related actions in a safe manner.
- C-2.3.3.2 Quality/Quantity Determination: All incoming delivery trucks shall be inspected, products sampled and visually examined in accordance with MIL-STD-3004 and NAVAIR 00-80T-109 to verify product identification and quality. Quantity determination, i.e., before and after gauging of tanks, computation of receipts at 60 degrees Fahrenheit as outlined in DOD 4140.25M, and the complete documentation of receipts, shall also be accomplished. Quality and quantity determination forms and supporting documents shall be forwarded to the accounting office by 0800 hours Monday, or the first duty day of the week, through Friday.
- **C-2.3.3.3 Workload Data**: The Exhibit of Product Receipts provides a historical view of workload data in terms of gallons received by month and the number of deliveries for the mode of delivery applicable. Data for product receipts at the service station facility, a separate storage area, are reflected in Section C-2.4, Service Station Operations.
 - > Requirement. Implement management, inventory, quality, security, and environmental controls so as to fully maintain and safely operate bulk storage facilities and equipment in a manner that ensures the receipt, proper handling and accountability, and timely availability of specification product to the customer without impact to the environment. The Contractor shall notify the Government of any circumstance that may result in the inability to perform the required services in a timely manner.

> Performance Standards

- ✓ Personnel to undertake/complete all assigned and required tasks (many simultaneous) available and positioned
- ✓ Readily capable of product receipt and issue operations for the days/hours reflected in Figure 1
- ✓ Inventory, receipt, and issue documents complete, accurate, legible, and forwarded to fuels accounting not later than 0800 Monday or the first duty day of the week through Friday
- ✓ Quantity determination, before and after gauge and temperature readings, accomplished for each receipt operation
- ✓ System and equipment functional inspections complete and documented prior to the first issue of the day every day the system is used to receive and issue product

- ✓ Scheduled Preventive Maintenance (PM), to include that of grounds maintenance, cleaning/evacuation of pits, and the upkeep of tank berm areas, completed on the day/date scheduled
- ✓ Environmental controls, i.e., secured drains, oily water separators, and alarm systems checked and functional
- ✓ Security controls, fences, gates, and lighting checked and logs maintained
- ✓ Preventive Maintenance (PM) documentation current, accurate, and available
- ✓ Samples taken and submitted for testing in accordance with MIL-STD-3004, NAVAIR 00-80T-109, Federal Specifications, and local directives
- ✓ Current references materials available (net access to or copies on hand)
- ✓ Spares and supplies that the Contractor is responsible for providing readily available
- ✓ No fuel spills the result of Contractor negligence or misconduct
- ✓ No operational delays the result of Contractor negligence or misconduct

C-2.3.4 Bulk Product Issues

- **C-2.3.4.1 Bulk Output**: Jet fuel issued from the direct refueling system day tank facility 2199 to VQ-4 E6A aircraft by a single pantograph during the hours outlines in <u>Table 1</u>, <u>Hours of Operation</u>. Except for scheduled maintenance and other occurrences of which the fuel dispatch center has been notified, the Contractor shall maintain the tank and system in the ready-to-issue mode. The "<u>Exhibit of Products Issued</u>" provides historical data regarding operations in term of product issued to the single customer, VQ-4.
 - > Requirement: Maintain and operate the VQ-4 direct refueling facility so as to receive, handle, and dispense quality products on demand. The Contractor shall institute security, quality, and inventory programs to ensure the issue of (maintain a tank system in the ready-to-issue mode) products without causing operational delays. The Contractor shall notify the COR of any discrepancy or issue that may result in the inability to issue product from the day tank system.

Performance Standards:

- ✓ All products issued shall be on specification
- ✓ No fuel spills due to Contractor negligence or misconduct
- ✓ No more than 0.5% variance tolerance as defined in Appendix D
- ✓ Immediate communication with the fuel dispatch center and COR regarding occurrences that may result in direct fueling system delays

C-2.4 Service Station Operations

- **C-2.4.1 General**: Service station operations, the dispensing of ground products from a fixed facility/system to authorized customers, are conducted at Bldg. 612. The service station, an automated but manned product storage and dispensing system shall be inspected, preventive/operator maintenance performed, products inventoried, system data collected, documented, and forwarded to fuels accounting, and the station readied for continued customer service for the days and hours reflected in <u>Table 1</u>, <u>Hours of Operation</u>. The Contractor shall be responsible for providing the qualified personnel to perform the aforementioned tasks and duties as further defined within this section.
- C-2.4.2 Operations: Low sulfur diesel fuel (LS2) and regular unleaded gasoline (MUP) are stored and dispensed at the base (military) service station. The station consists of two (2) 15,000-gallon vaulted underground MUP tanks and a single (1) 12,000-gallon vaulted underground LS2 tank plus common service station components as outlined in Appendix A, Government furnished Facilities. Both LS2 and MUP are delivered by commercial tank truck in 7,800-gallon increments as needed. The Contractor shall continually track ground fuels inventories and order products through the Fuel Management Office to maintain adequate levels of readily deliverable products at the service station. Product deliveries to the service station will normally be made during the operating hours for bulk storage listed in Table 1, Hours of Operation. The Exhibit of Product Receipts and the Exhibit of Products Issued provide a more definitive historical summary of service station operations.
- **C-2.4.2.1 Facility Workload**: Service station facilities and equipment shall be inspected, inventories performed, and visual quality surveillance applicable to the storage of such products performed by the Contractor. It should be noted that the escort of commercial delivery tank trucks to and the physical receipt of product at the service station are performed by the Government.

- **C-2.4.2.2 Accounting Data**: Inventory and accounting forms, logs, ledgers, and data as may be used to account for service station activities shall be forwarded to the fuel accounting office by 0800 hours Monday, or the first duty day of the week, through Friday.
- **C-2.4.3 Alternate Issues, Method, and Manning**: Disruption of automated service station function may require manual operation of the facility or the dispensing of products from a ground fuel servicing truck. As a rule, the facilities are repaired within the time it takes to identify the requirement for repairs and contract for repair services. The Contractor shall, for a period not to exceed five (5) weekdays, provide the personnel and equipment as outlined in the following sections to maintain the availability of ground fuel products to its customers. Weekend and holiday manning outside that specified in Table 1, Hours of Operation, and justifiable weekday manning costs beyond the aforementioned five (5) weekday rule may be submitted to the Government for reimbursement.
- **C-2.4.3.1 Station Operable**: In the event of a service station system failure during which the station **can be operated manually**, the in place Contractor personnel shall assist customers and manually document issues for the hours noted in <u>Table 1</u>, <u>Hours of Operation</u>.
- **C-2.4.3.2 Station Inoperable**: In the event of a power, system, or mechanical failure that renders the service station **completely inoperable**, the Contractor shall post directions to the alternate source of products and the hours of operation at that location or position the ground fuel servicing truck at the service station and man it to assist customers and manually document issue for the hours designated by the COR.
 - > Requirement. Implement management, inventory, quality, security, and environmental controls so as to fully maintain and safely operate the base (military) service station facilities and equipment in a manner that ensures the receipt, proper handling and accountability, and timely availability of specification product to the customer without impact to the environment. The Contractor shall notify the Government of any circumstance that may result in the inability to perform the required services in a timely manner.

> Performance Standards:

- ✓ Service station facilities manned, and equipment inspected and readied for customer use for the days and hours outlined by <u>Table 1</u>, <u>Hours of Operation</u>
- ✓ Facility PM accomplished as scheduled and facility cleanliness maintained
- ✓ Inventory documentation complete, legible, and forwarded to accounting by 0800 Monday, or the first duty day of the week, through Friday
- ✓ One hundred percent inventory accuracy
- ✓ Products ordered and received so as to maintain continuous availability of ground fuels to the base.
- ✓ One hundred percent receipt quality/quantity determination
- ✓ The Contractor capable of manual/truck operations for the hours specified

C-2.5 Ground Fuel Delivery

- **C-2.5.1** General: Ground fuel delivery operations are defined as the issue or defuel, by truck, of ground fuels, i.e., gasoline, diesel, heating oil, or jet fuel as may be used in lieu of diesel, to authorized customers. The Contractor shall be responsible for performing all ground fuel delivery operations, and safeguarding fuel supplies under its control during normal and adverse conditions. The Exhibit of Products Issued provides a more detailed historic picture of ground fuel deliveries by truck for the periods indicated. Also included in the exhibit is a listings of sites to which products are routinely delivered. The data provided should not be construed as an all-inclusive listing of ground fuel delivery points.
- **C-2.5.1.1 Equipment**: The Contractor shall furnish ground fuel servicing equipment configured in accordance with Section C-3.1.5, Ground Fuel Delivery Trucks, and the qualified/licensed personnel to operate and maintain all such equipment to undertake ground fuel delivery operations during the days and hours specified in Table 1, Hours of Operation. Equipment inspections shall be completed and documented on the vehicle inspection forms prior to the initial dispatch of the equipment for the duty day.

- **C-2.5.1.2 Delivery**: Ground fuels, regular unleaded gasoline (MUR), jet fuel used in lieu of diesel (JP5), and burner oil #2 (FS2) shall be delivered as scheduled to the activities outlined in <u>Exhibit of Products Issued</u>. Unscheduled requests for ground fuel deliveries, for which there is no specific response time, received by the fuel dispatch center shall be accomplished within the time limits mutually agreed upon by the requesting activity and dispatcher.
- **C-2.5.1.2.1 Off Station Operations**: Ground fuel deliveries to off station locations shall be accomplished using equipment that is configured and licensed/permitted for use on public roads. All Federal, DOD, state, and local inspections, permits, licensing and insurance requirements for the equipment used on public roads, shall be a responsibility of the Contractor. Vehicle operators shall be licensed as set forth in Section C-1.9.2.4.1, Licensing.
- **C-2.5.1.3 Delivery Points**: A list of delivery points by location, building/facility number, tank capacity and characteristics, and a delivery schedule, if known or established, is provided by the <u>Exhibit of Products Issued</u>. Maps identifying all established and scheduled delivery points, by grade of product, will be provided by NAS Patuxent River and become a part of the contract, <u>Appendix E, Maps</u>. At contract start up, the Contractor shall survey all delivery locations and confirm delivery schedules to ensure uninterrupted customer support. The Contractor shall routinely update the ground fuel delivery points and schedules outlined in <u>Exhibit of Products Issued</u> as changes occur.
- C-2.5.1.4 Data Collection: The Contractor shall use the automated data collection equipment (scanners) and forms provided by the Government to document each ground fuel issue. The Contractor shall maintain a daily truck log of all ground fuel issues, defuels, and truck fills. The log shall, at a minimum, reflect the date/time of service or truck fill, identify the facility or equipment serviced, the grade of product issued/defueled/filled, the quantity issued/defueled/filled, and the servicing vehicle number.
 - ➤ Requirement: Maintain and man the ground fuel servicing equipment to ensure customer support with specification products. Implement management, maintenance, quality, security, and environmental controls that ensure the safe delivery of ground products to authorized customers in a timely manner. The Contractor shall notify the COR of any discrepancy or circumstance that may result in the inability to deliver ground fuel products.

Performance Standards:

- ✓ All equipment inspected, serviceable, and inspection documentation readily available by 0800 daily.
- ✓ Daily truck inventories one hundred percent accurate.
- ✓ Documented issues, defuels, and truck fills one hundred percent complete, accurate, and legible.
- ✓ Ground fuel truck logs maintained and accurate.
- ✓ Ground fuel truck issues, defuels, and truck fills entered into the FAS Gas Log Monday through Friday.
- ✓ Fuel servicing safety procedures and precautions observed.

C-2.6 Used Oil Handling

- **C-2.6.1** General: Used oil collection and handling is defined as the pre-collection testing of products (if applicable), the collection, by truck, of fuel products no long suitable for their intended use, the intermediate holding of the products collected, and the disposal of those products. Disposal of used oil may be via turn-in to DRMO, the recycling of a product as is outlined in the following section, the blending of product into usable stocks, or as may be outlined by local instructions. The Contractor shall be responsible for performing all used oil collection and handling operations, and safeguarding the products collected.
- C-2.6.2 Equipment: The Contractor shall furnish the used oil collection and handling equipment specified in Section C-3.1.6, Used Oil (Fuel) Truck, in sufficient numbers to undertake the projected workload outlined in the Exhibit of Used Oil Collected, a data base that provides historical workload information and collection point characteristics. The Contractor shall fully maintain all furnished equipment and components thereof in a safe, serviceable, ready for dispatch condition. Equipment inspections shall be completed and documented on the vehicle inspection form prior to the initial dispatch of the equipment for the duty day.

- C-2.6.3 Collection: The Contractor shall collect used oil from the collection points identified in Exhibit of Used Oil Collected and respond to unscheduled requests for used oil collection services received by the dispatch center. Maps identifying all known collection points will be provided by NAS Alpha and included in the contract under Appendix E, Maps. The Contractor shall update the listing of used oil collection points and the map of collection locations as changes occur. At contract start up, the Contractor shall survey all identified locations and confirm collection schedules to ensure uninterrupted customer support.
- **C-2.6.3.1 Testing**: The Contractor shall adhere to local HAZMAT instructions and procedures regarding the testing of, collection, transport, storage and disposition of used oils.
- **C-2.6.3.2 Off Station Operations**: Should they be required, used oil collections from off station locations shall be accomplished using trucks that are configured and licensed for use on public roads. All Federal, state, and local inspections, permits, licensing and insurance requirements for the truck(s) used on public roads, shall be a responsibility of the Contractor. Operators shall be licensed as set forth in Section C-1.9.2.4, Driver/System Operator.
- **C-2.6.4 Documentation**: The Contractor shall document each used oil pick-up using forms provided by the Government. The Contractor shall maintain a daily truck log of all collections and disposals. The log, at a minimum, shall be used to record the date and time of collection or disposal (emptying of the truck), identify the facility or equipment from which used oil is collected, the quantity collected/disposed of, and the servicing vehicle number.
- **C-2.6.5 Requirements and Performance**: See the requirements and performance standards for <u>Section C-2.5</u>, <u>Ground Fuel Delivery</u>.
- C-2.7 Recyclable Jet Fuel Handling
- **C-2.7.1 General**: Recyclable jet fuel handling operations are not applicable under this contract.
- C-2.8 Cryogenic Storage and Distribution
- **C-2.8.1 General**: Cryogenic storage and distribution operations are defined as the receipt, storage and handling, and issue of cryogenic products, liquid oxygen (LOX), liquid nitrogen (LN2), and gases, to authorized customers. The Contractor shall be fully responsible for performing all cryogenic bulk handling, quality, maintenance, accounting, and administrative functions, and safeguarding the facilities, equipment, and products under its care.

Note

Other than the filling of carts and returning them to the customer or the ready line for customer pickup and assistance at purging (LOX wash) of LOX (ABO) carts, the contract shall not be responsible for maintenance of cryogenic equipment outside the bulk cryogenic facility.

C-2.8.1.1 Restrictions: The nature of cryogenic, specifically liquid/gaseous oxygen and the unique handling/quality requirements of Aviation Breathing Oxygen (ABO), dictate that the cryogenic storage and distribution function be manning by fully qualified personnel whose duties shall be restricted to that of the cryogenic function. Personnel assigned to the cryogenic storage and distribution function shall neither have collateral duties at nor be a collateral duty of personnel assigned to a fuel handling function during those hours considered to be the normal/continuous hours of operation for the cryogenic function. This restriction does not preclude the end-of-duty migration of cryogenic operators to other duties; however, the appropriate uniform/clothing changes shall be taken and qualification criteria meet.

- C-2.8.1.2 Operations: The Contractor shall staff to inspect, operate, and maintain cryogenic facilities and equipment and operate analytical devices as outlined in the most current version of OPNAVINST 4790.2, The Naval Aviation Maintenance Program (NAMP), and references, documents, and guidance contained therein. The Contractor shall man and operate the cryogenic storage and distribution facilities identified in Appendix A, Government Furnished Facilities, with a qualified cryogenic system supervisor and operators as outlined in Section C-1.9.2.9, Cryogenic System Operator (CS/O), for the days and times specified in Table 1, Hours of Operation. The Contractor shall be responsible for product receipts and handling, cryogenic system inspections and maintenance at the level defined herein, the post maintenance purging (LOX wash) of carts delivered to the cryogenics facility for that purpose, product sampling as outlined herein, product inventories, and the issue of liquid and gas products. The Contractor shall also be responsible for all inventory, housekeeping practices applicable to a cryogenic storage and distribution/ABO environment, and the security of products and facilities under its control. The Exhibit of Cryogenic Activities provides workload factors in terms of liquids received and liquids and gas products issued at NAS Patuxent River.
- C-2.8.1.3 Quality Surveillance: The Contractor shall continually track inventories and order cryogenic products in accordance with locally established procedures. On delivery, the Contractor shall obtain samples using the appropriate Government provided sampling device(s) and deliver those samples to the RDT&E Laboratory, Bldg. 1403, for testing. Test results received from the laboratory shall be reported to the COR. The Contractor shall maintain a record of all samples drawn and tested or submitted to an outside laboratory for testing. Copies of all test reports shall be maintained on file and available to the Government for the duration of the contract.
- **C-2.8.1.4 Issues**: The Contractor shall issue cryogenic products, both liquid and gas, to customer LOX/LN2 servicing carts and tanks, converters, cylinders/cylinder carts, and medical cylinders that are delivered to the cryogenic facility. Except for the movement of equipment within the confines of the cryogenic facility compound or specified herein, the Contractor is not responsible for the delivery or transport of equipment or products outside of the cryogenic facility compound.
- **C-2.8.1.5 Levels of Maintenance**: The Contractor shall be responsible for the following levels of maintenance.
- C-2.8.1.5.1 "O" Level Maintenance: The Contractor shall be responsible for the inspection and "O" level or organizational (operator) maintenance of cryogenic storage and distribution systems and facilities as outlined in OPNAVINST 4790.2, *The Naval Aviation Maintenance Program (NAMP)*. Operators shall inspect equipment, components, and facilities, make adjustments and perform operator maintenance as outline within applicable equipment technical manuals and Maintenance Repair Cards (MRCs), and maintain cleanliness applicable to a LOX/ABO environment. Discrepancies beyond the scope of operators maintenance program shall be documented and reported to the appropriate work center or agency via the COR. Grounds maintenance shall be accomplished as outlined in Section C-2.11.3, Grounds.
- C-2.8.1.5.2 "I" Level Maintenance: The Contractor shall maintain the cryogenic equipment at the intermediate (I) level and take all actions necessary and required to adjust, maintain, repair, remove, calibrate or have calibrated as may be required, and reinstall system components as indicated by the applicable Source, Maintenance and Recoverability (SM&R) codes outlined in equipment specific technical manuals. In addition, the Contractor shall perform quality assurance inspections of maintenance work accomplished as well as report and maintain records applicable to all maintenance/inspection actions taken.
- **C-2.8.1.5.3** "D" Level Maintenance: The Government will perform all depot (D) level maintenance.
- **C-2.8.1.5.4 Cylinder Maintenance**: Cylinder maintenance shall be restricted to that outlined in NAVAIR 06-20-2, Gas Cylinders (Storage Type), Use, Handling, and Maintenance, Section IX.
- **C-2.8.1.6 Records**: In addition to inventory documentation, the Contractor shall maintain a log of all receipts and issues for all products, product dispensed as a result of maintenance and cart purging (LOX wash), and product losses resulting from testing and preventive maintenance as may be performed on storage tank and the dispensing system. At a minimum, the specific event, i.e., issue to a cart, the date, start/stop/elapsed work time, equipment identification number, and quantity of product moved shall be recorded. All records shall be considered Government property and shall be kept on file and readily available to the Government for the duration of the contract.

- **C-2.8.1.7 Uniforms, Cryogenic**: The Contractor shall provide uniforms as outlined in <u>Section C-3.4, Uniforms</u>. In addition, the Contractor shall provide and maintain protective cryogenic coveralls, safety gloves, aprons, and face shields used during routine cryogenic handling operations.
 - Requirement: Cryogenic section staffed by trained/certified supervisors/operators capable of implementing management, quality, inventory, maintenance, and security controls so as to safely operate and fully maintain cryogenic facilities and equipment in a manner that ensures the timely receipt, proper handling, and availability of specification products to the customer. The Contractor shall notify the Government of any circumstance that may result in the inability to perform the required services in a timely manner.

Performance Standards:

- ✓ Fully manned by qualified personnel to undertake the level of work being accomplished for the hours specified in Table 1, Hours of Operation
- ✓ One hundred percent receipt quality/quantity accuracy is maintained
- ✓ One hundred percent inventory accuracy maintained
- ✓ Receipt, issue, and work logs kept to date and accurate
- ✓ All inventory/accounting documentation complete, legible, and forwarded to accounting by 0900 daily, Monday, or the first duty day of the week, through Friday
- ✓ Facility and equipment cleanliness applicable to an Aviation Breathing Oxygen (ABO) environment maintained
- ✓ Scheduled Preventive Maintenance (PM), to include grounds maintenance, completed on the day/date scheduled. One hundred percent MRC compliance maintained
- ✓ References applicable to the assigned cryogenic equipment current and readily available
- ✓ Supervisor/operator qualification documents and training records current and readily available

C-2.9 Inventory, Accounting, and Administration

- **C-2.9.1 General**: Inventory is defined as the physical measurement of products in terms of volume and temperature, the documentation of those measurements, and the conversion of observed measurements to standards recognized by the Government and petroleum industry. Accounting is the manipulation of inventory, receipt, and issue data to portray an accurate record of daily events regarding the purchase and sale of products, the adjustment of inventories, and the capture of information in the form of manual records and computer files. The contractor shall also be responsible for those administrative tasks, activities, and functions required to complete, record via the appropriate media, file, and report the aforementioned and other reporting outlined within the contract.
- C-2.9.2 Inventory: The Contractor shall be responsible for the inventory of petroleum and cryogenic products held within the facilities, equipment, tanks, and vehicles the responsibility of or under Contractor control. The Contractor shall provide accurate inventories of all products as outlined by DOD 4140.25, Bulk Petroleum Management Policy, NAVSUP Volume II, Supply Ashore, Navy regulations, and local instructions. Documentation consisting of inventory forms, receipt and issue documents, and the logs and reports as may be used to compile, compute, and validate accurate product movements shall be forwarded to the fuel accounting office by 0900 Monday, or the first duty day of the week, through Friday.
- **C-2.9.3 Accounting Regiment**: Within the framework of the standard DESC and Navy fuel accounting system, the Contractor shall establish a fuel accounting regiment that provides ready access to daily, monthly, or specific time segment information as may be defined by the Government. The processes, coupled with the fuel accounting files and records, shall facilitate:
 - ✓ The continuous update and accurate portrayal of information within the Fuels Automated Systems (FAS) and Fuels Enterprise Server (FES) system information
 - ✓ The import/input of ground fuel data to the FAS Gas Log for the periods specified by the Government
 - ✓ Daily data input and reporting as may apply to or cryogenic function
 - ✓ FAS/FES access, input, and report generation. Note requirements under Section C-2.16, Security
 - ✓ The provisioning of inventory and workload information, to include local reporting, as may be requested by the COR, other Navy activities, and DESC
 - ✓ Audits and inspections as may be conducted by the COR and other agencies
 - ✓ The reporting of workload factors for the PWS tables and exhibits as may be attached

C-2.9.3.1 Accounting Input and Reports: The Contractor shall complete all accounting functions daily. Fuel Automated System (FAS) modules, files, and records, and FAS Enterprise Server (FES) input and audits as may be applicable to the contracted activity, shall be accomplished daily. A summary report of receipts, issues (refuels/defuels), product inventories, and adjustments (gain/loss data) for the previous days activities, shall be provided to the COR by 1300 hours daily, Monday through Friday. In addition, the Contractor shall maintain and update PWS embedded tables and MS Excel exhibits (spreadsheets) referenced herein. Updated files, as outline herein or in the format provided, to include a copy of the FAS Monthly Summary Report, shall be submitted to the COR by the fifth workday of the month.

- **C-2.9.4 ADP Security**: See <u>Section C-2.16</u>, <u>Security</u>, regarding ADP security issues.
- **C-2.9.5 Files, Records, and Documents**: Inventory and accounting files, records, and documents equivalent in number to sum of all receipts, inventories, and issues of products, and other administrative actions as may be relevant to the handling of fuel and cryogenic products shall be managed and maintained by the Contractor. All are the property of the Government and shall be organized, stored in a neat accessible manner, and be made available to the COR on request.
 - Requirement: Process fuel and cryogenic receipt, transfer, issue, sales, and inventory documents. Post data to and/or validate entries to FAS and FES and makes allowable adjustments to and generates summary reports that accurately portrays the state of the fuel/cryogenic accounts. Advise the FMO, COR, customers, higher echelons of command, and the Defense Energy Support Center regarding account matters and maintain records and filing systems applicable to the accounting and administration for Fuels Management. The Contractor shall notify the Government of any circumstance that may result in the inability to perform the required services in a timely manner.

> Performance Standards

- ✓ Appropriately cleared personnel in place to perform the accounting function
- ✓ Accounting personnel knowledgeable and capable of work within the Fuels Automated System (FAS), FAS Enterprise Server, and other automated systems as may be applicable to the contracted activity
- ✓ Inventory/accounting processes, to include the update of computer systems, completed daily
- ✓ Out of tolerance conditions investigated, resolved, and documented
- Account(s) reconciled and reports generated and forwarded to the COR in a timely manner
- ✓ Files/documentation neat, legible, and filed for easy access
- ✓ Automated service station key/card systems controlled and maintained

C-2.10 Quality Surveillance

C-2.10.1 General: As outlined in Section C-1.4.3, Product Quality Surveillance Plan, the Contractor shall publish and adhere to a Product Quality Surveillance Plan commensurate with the level of quality surveillance applicable to and undertaken at NAS Patuxent River. The plan shall outline policies, methods, and procedures that ensure products under the Contractor's control and care remain on specification. The plan shall include, but is not necessarily limited to, product receipt and storage at the VQ-4 area, issue sampling, the visual examination of samples taken from equipment and facilities, the disposition of samples, and the documentation/reporting of the limited quality surveillance function. On acceptance, the Product Quality Surveillance Plan shall be incorporated into the contract. The Contractor shall continually review quality surveillance policy and practices applicable to the Navy and update the plan as required.

C-2.10.2 Quality Determination: No petroleum product shall be issued or returned to bulk until its quality and confirmation of conformance with specifications has been determined. Products shall be issued on a first-in, first-out basis unless otherwise specified or directed by the Government. Anytime product is received into a tank, regardless of source or reason, it shall be suspended from issue pending quality conformance sampling and notification of test results.

C-2.10.2.1 Sampling: Within the scope of operations for which it is responsible, the Contractor shall take all samples, i.e., VQ-4 receipt (pipeline transfer) samples, weekly truck and direct fueling systems inspection (Type "C") samples, daily visual truck inspection samples, and other visual samples as may be applicable to the movement of product. Those samples requiring more than visual analysis shall be delivered to the Government fuel laboratory for testing. Samples shall be taken in accordance with the API Manual of Petroleum Measurement Standards (MPMS), Chapter 8, Section 1, Manual Sampling of Petroleum and Petroleum Products, and MIL-STD-3004, Quality Surveillance Handbook for Fuel, Lubricants, and Related Products as may be supplemented by local instructions. NAVAIR 80T-109, Aircraft Refueling NATOPS Manual and local instructions dictate the location of samples to be taken, the frequency, quantity, and minimum test requirements. MIL-STD-3004, Quality Surveillance Handbook for Fuel, Lubricants, and Related Products also outlines the sample retention procedures applicable.

C-2.10.2.2 Testing: The Contractor shall conduct visual examination of products sampled and report suspect fuel/sample to the Government. Sample requiring more extensive testing shall be forwarded to the Government operated fuel laboratory.

Table 3 Quality Surveillance Samples and Tests

Quality Surveillance (1)								
Product	Samples (2)	Visual (3)	API Gravity	Particulate (4)	AEL Water (5)	Flash Point	FSII	EC (6)
Jet Fuel	6402	5362						
MUR	64	52						
FS2	64	52						
Jet Fuel (4)	24	24						

- (1) Data reflected herein is approximates for a fiscal/calendar year.
- (2) Total samples, by grade for the period indicated from sample all points, i.e., trucks, direct fueling system filters, tanks, and other equipment/points requiring testing requiring visual and/or laboratory analysis.
- (3) Number of visual examinations for particulate matter, free water, color, and appearance. The difference between (2) and (3) is the number of samples forwarded to the Government fuels laboratory (visual performed).
- (4) When not in continuous use, the Government furnished fuel servicing truck at NSWC Dahlgren shall be inspected, recirculated, and sampled every two (2) weeks. When in day-to-day use, the appropriate daily visuals and weekly Type "C" samples shall be taken. Samples requiring more than visual analysis shall be delivered to the Government fuel laboratory for analysis.

C-2.10.3 **Documentation**: The Contractor shall maintain a sample log and track sampling, and visual examinations of those samples. The sample log shall reflect the date and time a sample is received, the type of sample, and the test results. A log of samples requiring more extensive testing, i.e., the reason for testing, to whom a sample is sent, the sample size, and the tests required shall also be kept. A copy of all test results provided by any outside sources shall be maintained on file and be readily available to the Government on demand. The Contractor shall establish and publish procedures for disseminating information relevant to the sampling, testing, notification of test results, and isolation/release of products under the Contractor's care and control.

C-2.10.4 Records Keeping: The Contractor shall establish and maintain a system of files relevant to quality surveillance records and maintain all such records in a neat, orderly manner. Historical product quality records shall be kept on file for the duration of the contract and be made available to the Government on request. All quality surveillance records and logs are the property of the Government.

C-2.10.5 Housekeeping: Fuel sampling equipment shall be maintained to the degree of cleanliness and order commensurate with a "quality surveillance" program. Fuel samples shall be properly labeled and stored in the appropriate storage lockers, equipment cleaned and stored commensurate with a quality surveillance program.

➤ Requirement: Implement management, sampling and visual examination regiments, and administrative, security, and environmental controls that fully implement a quality surveillance program that ensures the receipt, proper handling, and timely availability of specification product to the customer without impact to the environment. The Contractor shall notify the Government of any circumstance that may result in the inability to perform the required services in a timely manner.

> Performance Standards:

- ✓ One hundred percent sampling prior to, during, and after all fuel receipts, transfers, and issues
- ✓ One hundred percent visual testing
- ✓ Qualified personnel on duty as outlined in <u>Table 1</u>, <u>Hours of Operation</u>
- ✓ Sampling and testing does not cause delays resulting in demurrage charges
- ✓ All receipt samples properly marked as to product, source, and date and stored as a retention sample
- ✓ Quality of all petroleum products received, stored and issued meet specification requirements
- ✓ Quality of all petroleum products is verified as suitable for their intended use
- ✓ Records and petroleum samples are maintained to resolve quality concerns
- ✓ Cleanliness and order maintained

C-2.11 Property Management and Maintenance

C-2.11.1 General: The Contractor shall be responsible for the normal and continuous use, operation, and real time reporting of discrepancies applicable to all systems, facilities, and equipment furnished by the Government and identified herein, and shall perform the preventive and operator maintenance required to keep all such fuel and cryogenic systems, facilities, and equipment functional. The Contractor shall provide all manpower, materials, tools, instruments, devices, and equipment not otherwise specified as Government-furnished but directly or indirectly required and called for within this contract or references cited to accomplish all work requirements at the level and scope sited herein. The purchase of repair services and supplies beyond the scope of the preventive/operator maintenance program will, given the appropriate approvals, be reimbursed under Section C-4.0, Logistics Support, Cost Reimbursable.

C-2.11.2 Maintenance Categories:

- **C-2.11.2.1 Preventive Maintenance**: Preventive maintenance is a program of periodic or cyclical inspections and servicings designed to preserve and maintain facilities, equipment, and apparatus in such a condition that they may be effectively used for their intended purpose. Preventive maintenance will normally be limited to those actions that can be taken by qualified system operators using common hand tools and specialized tools or instruments as may be prescribed by a specific PM procedure.
- **C-2.11.2.2 Operator Maintenance**: Operator maintenance is that work accomplished during routine inspections, other than PM, and system use/operation. Operator maintenance may include, but is not necessarily limited to work such as the replacement of ground wires, plugs, and clips, the replacement of seals, O-rings, the lubrication of components, the tightening of nuts, bolts, and screws to prevent leakage and to stabilize equipment, or corrosion control and spot painting. Operator maintenance is normally limited to actions taken by system operators using common hand tools.
- C-2.11.2.3 Other Maintenance and Repair: Except as specifically outline herein, maintenance and repair beyond that defined as preventive and operator maintenance, i.e., breakdown maintenance or the unplanned repair or replacement of components that show abnormal wear or fail, must be approved by the COR. Tasking and reimbursable for other maintenance and repair actions on the part of the Contractor will be provided as outlined by Section C-4.2, Services Requiring a Task Order.

C-2.12 Preventive Maintenance - Facilities and Equipment

C-2.12.1 General: The Maintenance Plan outlined in Section C-1.4.6, Maintenance Plan, shall provide for the inspection, servicing to the extent applicable under a PM program and as outlined herein, the removal, calibration, and replacement of equipment, and the care of facilities at specified intervals. Appendix A, Government Furnished Facilities, and Appendix B, Government Furnished Equipment, Supplies, and Services, provides listings of facilities and equipment requiring preventive maintenance and shall serve as the base line for the Maintenance Plan. The plan shall provide for a systematic approach to planning, scheduling, documenting, reporting, and managing (labor, materials, time, and costs) those actions that contribute to the uninterrupted function of the fuel facilities and systems. The plan shall include periodic inspection; testing, and minor repair of equipment and facilities in accordance with federal and military specification and standards as well as manufacturer's recommended or commercially accepted practices. To that end, the Government may direct the Contractor to perform practical demonstrates of equipment, procedures, skills, capability, and method for those maintenance and PM processes requiring adherence to measurable standards and skills or the use of specialized instruments, equipment, and tools. See Section C-2.8, Cryogenic Storage, and Distribution, regarding the maintenance of cryogenic systems.

Note

The requirements to inspect, perform preventive and operator maintenance, or other wise be tasked to maintain, applies only to the facilities that make up the VQ-4 direct refueling system (from the upstream flange of the primary system receipt valve to and including the single point nozzle at the end of the pantograph) and the base (military) service station.

- C-2.12.2 Preventive Maintenance Inspections: The following inspections are applicable to NAS Patuxent River. The codes following each item heading, i.e., C-2.12.2.18 Gauges (Pressure, Differential, and Vacuum) (A), indicates the scheduled preventive maintenance cycle of Annual. The codes (C for continuous or daily observation during system inspections and monitoring during routine work or system operations, D for daily, W for weekly, M for monthly, Q for quarterly, SA for semi-annual, A for annual, and in some cases AR for as required) do not dictate or imply it is the only time an item will be monitored or inspected. In all cases, discrepancies noted as part of the daily system inspections, during preventive/operator maintenance inspections, and during routine use/operation of the system shall be fully documented, reported, and, if within the scope of this PWS, corrected. In all cases, damage, defects, and the need for repairs deemed beyond the expertise of the Contractor or outside the scope of normal preventive maintenance shall be documented and reported to the COR. However, the Contractor may be tasked under Section C-4.2, Services Requiring a Task Order, and shall take the appropriate action dictated by such a tasking.
- **C-2.12.2.1 Buildings and Structures** (**C**): The Contractor shall ensure that all buildings, structures, and facilities used by or under Contractor control are kept clean and sanitary. The Contractor shall sweep, mop, and wax floors and wash windows and walls of occupied buildings or office spaces to present a clean, orderly appearance. Maintenance and storage buildings shall be kept in clean and orderly manner. Areas immediately around buildings for which the Contractor is responsible shall be kept free of debris. The Contractor shall not allow fire hazards, such as oily rags, loose paper, and trash to accumulate in or around buildings, structures, facilities, and areas used, occupied, or controlled by the Contractor.
- C-2.12.2.1.1 Pest, Rodent, and Vegetation Control (AR): Requests for pest, rodent, and vegetation control shall be forwarded to the COR.

NOTE

The use of pesticides, insecticides, fungicides, and rodentcides by the Contractor is prohibited.

C-2.12.2.1.2 General Maintenance (AR): The Contractor shall reset circuit breakers and switches, furnish and replace burned out standard and fluorescent lights, and plunge sinks and toilets to keep them serviceable. The requirement for other building/structure maintenance, i.e., electric, carpentry, and other skilled trade work shall be documented and forwarded to the COR. The Contractor shall not alter any structure or allow it to be altered without explicit written approval by the Government.

- C-2.12.2.1.3 Designated Areas: The Contractor shall establish a smoking policy that prohibits smoking in other than Government designated areas. The Contractor shall provide signs to be posted at the entrance to work areas that read, "NO SMOKING EXCEPT IN DESIGNATED AREAS." The Contractor shall also designate a smoking area and provide signs that read, "DESIGNATED SMOKING AREA."
- **C-2.12.2.2 Trash Removal (W)**: The Contractor shall be responsible for the pick-up of all trash and debris within and around fuel and cryogenic areas under its controlled, and shall dispose of all such trash and debris in Government-furnished containers/dumpsters. The Government will dispose of the trash and debris placed within the containers/dumpsters provided.
- **C-2.12.2.3 Grounds (C)**: Grounds maintenance, grass cutting and vegetation control, is the responsibility of the Government, however; however minor or cleanup grass and weed control around Contractor maintained buildings and facilities shall be accomplished by the Contractor.

Note

The use of herbicides by the Contractor is prohibited. The Government will undertake any application of herbicides.

- **C-2.12.2.4 Roads and Paved Surfaces (C)**: All roads, paved surfaces, curbing, and sidewalks within contracted fuel management areas shall be monitored continuously.
- **C-2.12.2.5 Fences and Gates (C)**: The Contractor shall inspect all fences, to include signs and markings, gates and automatic gate openers, of fuel management compounds.
- C-2.12.2.6 Lighting (C): Exterior lighting, security lighting, and exterior building lights will be monitored on a continuous basis.
- C-2.12.2.7 Other Facilities, Equipment, and Utilities (C): The Contractor shall continuously monitor other facilities, equipment, and utilities, i.e., fire hydrants, AFFF systems, storm drains, exterior water systems, power poles, lines and transformers, and exterior telephones within Fuel Management areas.
- C-2.12.2.8 Storage Tanks (W): The Contractor shall visually inspect the exterior of all storage tanks and tank components and visually examine the various samples taken from the tanks on a continuous basis. All inspections and visual examinations shall be documented and corrective action within the scope of PM/operator maintenance accomplished as deficiencies are noted. Maintenance requirements such as the need for exterior corrosion control and painting of tank(s) and tank inspection/cleaning as may be indicated by the visual examination of drawn samples shall be recorded on the appropriate inspection documents and reported to the COR.
- **C-2.12.2.8.1 Tank Maintenance**: The Government will be responsible for the complete painting of tanks and internal tank inspection and cleaning. Upon notification of a cleaning or repair project, the Contractor shall, to the extent possible, use installed system-pumping equipment to empty/ready all selected tanks for cleaning and inspection. On completion of tank cleaning or repairs by another party, the alongside Contractor shall perform and document a complete external tank/system inspection to ensure all tanks and system components have been returned to a ready to use state and can be returned to service. The Contractor shall update all PM systems, programs, and records.
- C-2.12.2.9 Berms/Containment Systems (C): The Contractor shall ensure that all berms and containment systems are kept clean, free of vegetation, and other debris that may hamper proper system drainage. Drain valves shall be inspected and actuated monthly. The Contractor shall clean all moats, i.e., keep them free of accumulations of dirt, debris, and vegetation. The direct discharge of any liquid from any berm/containment system shall comply with all Spill Prevention Control and Countermeasures (SPCC) plan and National Pollution Discharge Elimination System (NPDES) permit as applicable. The Contractor shall maintain a clear, concise log as to the dates and time berms are drained, observed conditions of the water drained, and who performed the drain operation. Except as required to physically clean and drain berm areas, drain valves, devices, and outlets shall be kept secured in the closed position and locked. Keys shall be controlled as outlined in local lock and key control security instructions.

- C-2.12.2.10 High/Low Level Alarms and Control Valves (Q): The Contractor shall functionally test installed alarm systems, i.e., low, high, and high-high tank level horns, lights, control board statue lights and signals, and low/high level control valves as may be installed quarterly. A systems status report shall be forwarded to the COR on completion of testing.
- **C-2.12.2.11** Automatic Tank Gauge (ATG) System (Q): The Contractor shall monitor ATG systems continuously. ATG readings shall be validated by manual gauging quarterly or as directed by local policy. A systems status report shall be forwarded to the COR on completion of gauge validation/testing.
- C-2.12.2.12 Pumps, Reduction Gears, and Pump Motors (Q): The Contractor shall maintain all the fuel system pumps, reduction gears, and pump motors in a serviceable condition through scheduled inspections and PM. The Contractor shall adjust packing and stuffing glands, inspect mechanical seals, provide lubrication, replace gaskets and seals not requiring component tear-down, and tighten loose nuts, bolts, and screws to prevent leaks and to stabilize equipment. Pump motors shall be inspected during operation for excessive noise and vibration.
- **C-2.12.2.13 Valves and Valve Motor Operators (Q)**: The Contractor shall inspect and perform preventive/operator maintenance on all types of valves (gate, ball, globe, plug, both lubricated and non-lubricated, check, and double block and bleed, etc.). The Contractor shall inspect, clean, lubricate as needed, and operate/actuate each system valve to ensure proper function. Motor operators shall be inspected, cleaned/lubricated as needed and actuated to ensure proper operation.
- C-2.12.2.13.1 Valve Sub-Assemblies (C): Flow control valves with pilot, solenoid, and pressure relief control assemblies shall be monitored on a continuous basis. Discrepancies such as erratic performance or valve failure shall documented and reported to the COR.
- **C-2.12.2.13.2 Miscellaneous Small Valves (C)**: Miscellaneous small valves, all types less than 1.5 inches, shall be monitored continuously. Noted discrepancies shall be recorded and the Contractor shall undertake the work necessary to repair or replace such valves found to be defective. See <u>Section C-3.3.1.8</u>, <u>Spares for Government Furnished Equipment/Facilities</u>, regarding the provisioning of spares, replacement parts, and small components.
- C-2.12.2.14 Filter Separators and Monitors (C): The Contractor shall inspect/monitor filter separator and fuel monitor vessels and components, i.e., sight gauges, flow indicators, and air eliminators, continuously. Systems shall be inspected, water drained, differential pressure readings recorded, and components calibrated/tested as outlined by applicable manufacture's pamphlets, industry standards, and military specifications. See Section C-3.3.1.8, Spares for Government Furnished Equipment/Facilities, regarding the provisioning of spares, replacement parts, and small components, excluding filter and monitor elements, which will be provided by the Government.
- **C-2.12.2.14.1 Element Changes**: In addition to the normal PM process, the Contractor shall be responsible for physically changing filter separator and fuel monitor elements, and maintaining the filter/monitor vessels, i.e., replace worn components such as gaskets, spacers, washers, and other minor parts. The Contractor shall control and prepare used elements for disposal in accordance with local environmental regulations. See <u>Section C-3.3.1.8</u>, <u>Spares for Government Furnished Equipment/Facilities</u>, regarding the provisioning of spares, replacement parts, and small components.
- **C-2.12.2.14.2 Other Filters**: Small in-line filters, service station dispensing pump filters for instance, shall be monitored for time and throughput and replaced in accordance with manufacturer's recommendations. See <u>Section C-3.3.1.8</u>, <u>Spares for Government Furnished Equipment/Facilities</u>, regarding the provisioning of spares, replacement parts, and small components.
- **C-2.12.2.15 Relaxation Chambers (C)**: The Contractor shall inspect relaxation chambers for stress fractures, leaks, and operation of the components attached. Pressure/thermal relief valves, pressure gauges, inlet/outlet control valves, and other components as may be installed shall be monitored, tested, or calibrated as required for the specific component.
- C-2.12.2.16 Strainers (All Types) (M): The Contractor shall inspect and clean system strainers monthly or more often as may be deemed necessary by system condition, flow, and pressure indicators. Defective strainers shall be replaced as necessary. See Section C-3.3.1.8, Spares for Government Furnished Equipment/Facilities, regarding the provisioning of spares, replacement parts, and small components.

- **C-2.12.2.17 Meters (S)**: The Contractor shall monitor meters on a continuing basis. All meters shall be calibrated semiannually, when a meter is suspected to be out of calibration, whenever a meter is serviced, or when a meter has been damaged.
- **C-2.12.2.17.1** Calibration Standards: The Contractor shall calibrate meters or arrange to have calibrations performed by an agent that is trained to perform such work. Calibrations shall be performed as part of the Navy Calibration and Metrology program and traceable to National Institute of Standards and Technology (NIST) standards. The Contractor shall maintain a log of all calibrations performed. This log shall be available for inspection by the COR on request.
- **C-2.12.2.18 Gauges (Pressure, Differential, and Vacuum) (A):** The Contractor shall inspect gauges continuously and as part of the scheduled PM program. The Contractor shall remove, calibrate or arrange to have calibrations performed by an agent certified for such work, and replace all such gauges in accordance with <u>NAVFAC MO-230, Maintenance and Operation of Petroleum Facilities</u>, (see the NIST standard noted above). See <u>Section C-3.3.1.8</u>, <u>Spares for Government Furnished Equipment/Facilities</u>, regarding the provisioning of spares, replacement parts, and small components.
- **C-2.12.2.19 Pressure/Thermal Relief Valves (A)**: The Contractor shall monitor all installed pressure/thermal relief valves as part of its daily inspection program. As scheduled within the PM system, the Contractor shall remove, bench test, and replace pressure/thermal relief valves in accordance with <u>NAVFAC MO-230</u>, <u>Maintenance and Operation of Petroleum Facilities</u>, or the manufacturer's recommendations.
- C-2.12.2.20 Piping/Pipelines (A): The Contractor shall monitor piping and pipeline systems, to include all types of expansion joints, continuously. Active cross-country pipelines and pipelines outside of fuel management compounds, shall be monitored by line patrol. All piping shall be identified in accordance with the most current MIL-STD-161, Identification Methods for Bulk Petroleum Products Systems Including Hydrocarbon Missile Fuels, and inspected and maintained in accordance with NAVFAC MO-230, Maintenance and Operation of Petroleum Facilities. The Contractor shall be responsible for spot painting/remarking of lines, keeping pipelines free of water/solids through low point drains, and keeping line/valve pits clean and dry. The Contractor shall maintain the pipeline right-of-way.
- **C-2.12.2.20.1 Pipelines Repairs**: The Government will be responsible for pipeline replacement, major repairs, and annual hydrostatic testing of all lines. After any testing/repair action, the Contractor shall inspect, pressurize, and re-inspect the affected lines to ensure the integrity of the line and repairs performed before returning the pipeline to service.
- **C-2.12.2.21 Loading Arms, Pantographs, and Nozzles (Q)**: The Contractor shall inspect and maintain all loading arms, pantographs, and nozzles in accordance <u>NAVFAC MO-230</u>, <u>Maintenance and Operation of Petroleum Facilities</u>.
- C-2.12.2.22 Couplers, Connectors, and Swivels (Q): The Contractor shall inspect and monitor all such fixtures, to include quick disconnect and emergency dry breakaway couplers. Leaks, wet spots, erratic mechanical operation, and the need for excessive force to operate such equipment shall be documented and reported to the appropriate work center for repairs. See Section C-3.3.1.8, Spares, regarding the provisioning of spares, replacement parts, and small components.
- C-2.12.2.23 Hoses (All Types) (A): Fuel hoses normally detached after an operation shall be drained, capped, and properly stored and protected from the elements after each use. Attached hoses, such as those at a fillstand, shall be properly stored and protected to the maximum extent possible. All hoses shall be inspected for cuts, abrasions, general wear and tear, and fitting/swedge movement continuously. See Section C-3.3.1.8, Spares for Government Furnished Equipment/Facilities, regarding the provisioning of spares, replacement parts, and small components.
- **C-2.12.2.23.1 Testing (A)**: The Contractor shall test and mark hoses as outlined in <u>NAVFAC MO-230</u>, <u>Maintenance and Operation of Petroleum Facilities</u>.

C-2.12.2.24 Pits (M): The Contractor shall keep all pipeline and component pits clean and free of debris, water, and fuel. The Contractor shall remove any water and/or fuel that may accumulate in pits and shall periodically air pits to reduce/prevent corrosion. Should any pit appear to contain excessive fuel or fuel vapors, the Contractor shall inspect all pipeline connections (flanges), valves, and controls, to locate and correct the problem. Should the scope of repair work be outside the capabilities of the Contractor, the discrepancy shall be documented and forwarded to the COR. Appropriate confined space safety measures shall be observed.

Note

Pits known to be less than watertight shall be identified, marked, and monitored continuously. Appropriate work requests for the repair, sealing, or possible replacement of such pits shall be submitted and monitored.

- C-2.12.2.25 Manifolds (M): The Contractor shall inspect manifolds for leaks and general condition of equipment as part of its daily inspection process. The Contractor shall perform preventive and operator maintenance to including, but not necessarily limited to, the calibration of gauges, the actuation of valves, the tightening of nuts, bolts, and screws necessary to stabilize equipment and components, and spot painting. The Contractor shall keep manifolds pits, slabs, and surrounding areas clean, free of debris, and vegetation controlled as outlined in Section C-2.11.3, Grounds.
- C-2.12.2.26 Pier Facilities (Piping, Risers, and Valves) (Q): Pier fuel facilities are not applicable under this contract.
- **C-2.12.2.27 Pier Loading Arms (S)**: Pier loading arms are not applicable under this contract.
- C-2.12.2.28 Truck Fillstands/Fill Points (Q): Not applicable.

Note

The Contractor's first order of system inspection and maintenance task may be to replace the ground fuel bottom loading connections so as to be compatible with those dictated by <u>Section C-3.1.5.6.1</u>, <u>Bottom Loading Connection(s)</u>.

- **C-2.12.2.28.1 Sensing Systems (C):** Overfill protection and grounding systems, i.e., Scully and OPW overfill protection, and Scully Ground Hog grounding system shall be monitored on a continuing base. Discrepancies shall be recorded and reported to the COR.
- C-2.12.2.28.2 Housekeeping (C): The Contractor shall ensure the fuel system areas are kept clean, free of debris, and that containment areas are free of water and product residue.
- C-2.12.2.29 Oil/Water Separator System (M): The Contractor shall visually inspect containment basins and maintain logs regarding observations.
- C-2.12.2.30 Cathodic Protection System (M): Cathodic protection systems are maintained by Public Works.
- C-2.12.2.31 Electrical Bonds, Grounds, and Insulators (M): Electrical bonds shall be checked for continuity of current flow, static grounds for resistance, and insulators for non-flow of current. Inspection and checks shall be made as outlined by NAVFAC MO-230, Maintenance and Operation of Petroleum Facilities, and records of readings maintained.
- C-2.12.2.31.1 Bulk Storage Tanks (Q): System tank grounds shall be inspected quarterly. Visually inspect the ground connections around the periphery of the base, tighten loose connections, clean corroded connections.
- **C-2.12.2.32 Shower and Eyewash Stations (W)**: The Contractor shall inspect and test shower and eyewash stations for proper function.

- **C-2.12.2.33 Corrosion Control and Painting (C)**: The Contractor shall perform corrosion control and minor painting (of those systems requiring painting) as part of housekeeping. Minor/spot painting consists of preparing, applying primer, and repainting small surfaces areas and small components, i.e., valves, strainer, and motors, to protect surfaces from corrosion and to preserve appearances. The Contractor shall also apply color code bands and symbols as outlined in <u>MIL-STD-161</u>, <u>Identification Methods for Bulk Petroleum Products Systems</u>.
- **C-2.12.2.33.1 Large Surfaces**: The Contractor will not be required to paint large vertical surfaces such as buildings and tanks or entire pipeline systems.
- **C-2.12.2.33.2 Materials Used**: Paint and primer used shall be an oil base type suitable for use on metal and exterior surfaces and shall be matching or compatible with the existing paint scheme.

C-2.12.2.34 Spill Remediation Equipment:

- C-2.12.2.34.1 Kits (C): Government provided spill remediation kits of all sizes and types shall be inspected and monitored continuously. The Contractor shall furnish replacement supplies/kit components. See <u>Section C-3.3.1.8</u>, <u>Spares for Government Furnished Equipment/Facilities</u>, regarding the provisioning of spares, replacement parts, and small components.
- **C-2.12.2.35 Service Station Facilities** (**C**): Service station facilities, manual or automated, shall be inspected and monitored continuously. Components, i.e., tanks, filters, pumps, hoses, nozzles, and other relevant items as may be identified above shall be inspected as outline above as a part of the fuel management PM program. See <u>Section C-3.3.1.8</u>, <u>Spares for Government Furnished Equipment/Facilities</u>, regarding the provisioning of spares, replacement parts, and small components.
- **C-2.12.2.36 Government Vehicle (NSWC Dahlgren)**: When not in continuous use, the Contractor shall perform a walk-around inspection, functional check, and sample the fuel servicing truck at every two (2) week. In day-to-day use, the appropriate daily inspection, recirculation, and sampling shall be performed. In addition, the Contractor shall be responsible for the labor required to change the filters as may be required (time versus throughput). Materials will be provided by the Government.
 - Requirement. Inspect and maintain fuel facilities and equipment so as to be fully capable of performing all scheduled product receipt and delivery operations and/or respond to non-scheduled service requests received by the dispatch center. Operate system for the days/hours specified herein to provide the customer with quality products and services in a safe and timely manner. Capture workload data and maintain records that fully summarize work accomplished in terms of time, cost, and materials. Advise the Government of any circumstance that may result in the inability to perform the required services in a timely manner.

> Performance Standards:

- ✓ Assigned system operators qualified and knowledgeable of inspection and maintenance requirements. Training records current
- ✓ Facilities, structures, equipment, and grounds maintained so as to present a clean and orderly appearance and a safe work environment
- ✓ Facility, system, and equipment reference files maintained and current
- ✓ The Preventive Maintenance (PM) program installed, maintained and current
- ✓ Preventive/operator maintenance performed as scheduled/required
- ✓ Preventive/operator inspections and maintenance fully documented
- ✓ Maintenance beyond normal PM/operator programs documented and reported to the COR

C-2.13 Training and Records Keeping

C-2.13.1 Training Plan and Program: The Contractor shall establish and maintain a training program that is acceptable to the Government. The plan, both summary and final, shall be provided to the Government as outlined in Section C-1.4.11, Training Plan. On acceptance, the complete training plan shall become a part of the contract. The training plan/program shall ensure that all contract personnel receive training ranging from initial employee indoctrination to fuel safety and environmental issues as may be outlined in but not necessarily limited to in the following table. Training shall be fully documented within each individuals training record. The <u>Personnel Qualification Standard (PQS) for Aviation Fuel Operations Ashore, NAVEDTRA 43288A</u>, and <u>Oxygen/Nitrogen (O_2N_2) Systems, NAVEDTRA 43107-C</u>, shall be used as the core training record for all fuel and cryogenic personnel respectively.

C-2.13.2 Training Monitor: The Contractor shall appoint a responsible individual the collateral duty of Training Monitor, the primary point of contact regarding training and records keeping issues.

C-2.13.3 Training Records: Training records shall be kept current and information posted thereto as training occurs. Training records shall be made available to the Government on request. All training documents or a complete copy thereof, excluding proprietary company information, shall be provided without cost to an employee on termination of duties with the contractor.

Table 4 Training Requirements

Training (1)
Base Driver Training and Familiarization to include Flightline Operations
Fire Prevention and Control
Confined Space Entry (as applicable)
Protection of the Environmental
Facility Response Plan (FRP)
Hazardous Communication
Hazardous Waste Operations and Emergency Response
Lock-Out/Tag-Out Procedures
Safe Transportation of Hazardous Materials
Fuel System Safety

(1) Except as may be specified by other sections of this contract, the government is not obligated to train or provide training to contract personnel. However, incidental training as may be mandated by the base and provided without cost to the Contractor, i.e., fire prevention or base/flightline familiarization, shall be fully documented within an employee's training record.

➤ Requirement: The Contractor shall continually develop and train personnel to enhance work habits and improve skills applicable to the petroleum and cryogenic management mission. Training relevant to equipment operation, product handling and safety procedures, quality and quantity determination, environmental protection, and administrative/accounting functions shall be provided as applicable. The Contractor shall advise the Government of any circumstance that may result in the inability to perform the required services.

Performance Standards.

- ✓ The Contractor's Training Monitor is identified
- ✓ A complete and current copy of the contract Training Plan readily available to the Government on request
- ✓ One hundred percent compliance with the government accepted training standards
- ✓ All training records complete and annotated regarding required training as outline in the training plan
- ✓ Training materials, literature, documents, aids, and information readily available to all personnel

C-2.14 Safety Program

C-2.14.1 Safety Plan: As noted in <u>Section C-1.4.9</u>, <u>Fuel and Cryogenic Safety</u>, the Contractor shall publish and maintain a comprehensive fuel and cryogenics safety program that complies with applicable Federal, state, and local laws

and Navy instructions and regulations. The following table lists those safety plans/topics to be provided by the Contractor and Government plans to be incorporated in the Contractor's final safety plan. On acceptance, the safety plan shall become a part of the contract.

- **C-2.14.2 Safety Monitor**: The Contractor shall appoint a responsible individual the collateral duty of Safety Program Monitor, the primary point of contact regarding the Contractor's safety program.
- **C-2.14.3 Safety Materials**: A copy of the safety plan supported by applicable safety literature, training aids, and other safety training materials shall be made available to contract employees.
- **C-2.14.4 Accident/Incident Reporting:** All duty related accidents and incidents, to include traffic violations involving Contractor operated equipment, for which the Contractor or contract personnel are responsible or involved in shall be reported to the COR immediately or, depending on the severity and circumstances, as soon as practical. All accidents and incidents shall be fully documented and a copy of all initial draft and final accident/incident reports forwarded to the COR with the next duty day documents and reports. Also see Section C-2.15.5, Spill Reporting, regarding product/material spills.

Table 5 Safety Plan

Safety	
Industrial Hygiene Plan (Physical survey performed by the Government.)	
Confined Space Entry Plan (Provided by the Contractor as applicable.)	
Disaster Preparedness Plan (Provided by the Government.)	
Fire Prevention and Protection Plan (Provide for all Contractor used and controlled systems and facilities.)	
Hazardous Waste Operations and Emergency Response Plan (Provided by the Government.)	
Safety and Health Standards Plan	
Accident/Incident Reporting	

> Requirement: Establish a comprehensive safety program and publish a safety plan. Train personnel to recognize potential hazards, avoid exposure to danger, and to develop safe working habits and skills applicable to petroleum and cryogenics related operations so as to minimize disruptions to customer support. The Contractor shall advise the Government of any circumstance that may result in the inability to perform the required services.

Performance Standards:

- ✓ The Contract's Safety Plan available to the Government and contract personnel
- ✓ All safety materials, training aids and documents readily available to contract personnel
- ✓ Contractor safety monitor appointed
- ✓ One hundred percent documentation and compliance with government approved safety plans
- ✓ One hundred percent documentation verifying all operations are conducted in accordance with government approved procedures

C-2.15 Environmental Protection

- C-2.15.1 Compliance: The Contractor shall, as stated in Section C-1.4.4, Environmental Protection Plan, publish a comprehensive environmental plan that complies with and compliments the Government provided environmental plans listed below. The Contractors plan shall be site specific, cover all areas, facilities, equipment, duties, and tasks for which the contractor is responsible, establish misshape reporting procedures as required below, and should elaborate on issues that may be unique to the activity, i.e. operator pre-testing of used oils collections (not required at all activities). The Contractor shall be fully responsible for compliance with all Federal, state, and local environmental code, regulation, and laws in effect at the time of contract start and shall comply with all additions, changes, and revisions as may become effective during the contract period.
- **C-2.15.2 Permits and Licenses**: Environmental permits and licenses required for the operation of Government fuel facilities will be obtained by and kept on file by the Government.
- **C-2.15.3 Training**: The environmental training listed in <u>Section C-2-13</u>, <u>Training and Records Keeping</u>, or as may be relevant to the requirements of this section and the plans outlined shall be the responsibility of the Contractor.
- C-2.15.4 Assignments: The activity Spill Prevention Control and Countermeasures (SPCC) plan may designate contract management/personnel to serve as the On Scene Coordinator (OSC) relevant to fuel facilities under the control of the Contractor and outlined herein. In addition, fuel dispatchers may be designated as the contract fuels management Initial Point of Contract (IPOC) regarding fuel spills within fuel management areas under the control of the Contractor, or actions relevant to operations involving contract personnel. In concert with the base environmental goals, the Contractor shall train personnel regarding all required duties relevant to the assigned tasks.

Table 6 Environmental Protection

Environmental				
EPA Hazardous Waste Management System	40 CFR, Chapter 1, Part 260			
Facility/Emergency Response Plan (OPA 90)	33 CFR 154, 40 CFR 112, 49 CFR 194			
National Pollutant Discharge Elimination System (NPDES) Permit Plan	40 CFR, Chapter 1, Part 122			
Oil Pollution Prevention Operations Manual	33 CFR 154			
Spill Prevention Control and Countermeasures (SPCC) Plan	40 CFR, Chapter 1, Part 112			
High/Low Level Alarms and Control Valve System Status Report	Section C-2.12.2.10			
HAZWOPR/First Response Training	29 CFR, Chapter 17, Part 1910			

- C-2.15.5 Spill Reporting: In addition to any and all formal Government requirements for the reporting of fuel spills, the Contractor shall provide a simplified report of all spills involving the Contractor, its personnel, equipment, systems, and processes for which it is responsible. Outside aircraft venting incidents (refueling), minor seepage or weepage of system/equipment components, or the capture of small amounts of fuel in drip pans incidental to maintenance, i.e. nozzle changes or strainer cleaning, the spill and loss or recovery of product shall be reported to the COR, the DESC-FPB Contracting specialist responsible for the contract, and NOLSC Petroleum N423 and N423B. All reports shall be immediate (same day) written (e-mail) accounts of the circumstances surrounding the spill, the estimated amount of the spill, and actions taken to remediate the spill.
- C-2.15.6 Supplies and Equipment: The Contractor shall be responsible for the inspection, inventory, and care of the spill containment and clean up kits outlined under Section C-2.12.2.34, Spill Remediation Kits (facilities), and Section C-3.1.2.10, Spill Remediation Kits (vehicles). Consumables, i.e., small spill barriers, absorbent pads and compounds, squeegees, mops, rags, and other materials required to replenish kits or maintain all kits at 100 per cent usable level shall provided by the Contractor.

➤ Requirement: Publish an environmental protection plan and train, assign, and task personnel to take all required and necessary actions to prevent, control, or abate environmental pollution relative to the fuel facilities, activities, and programs under the Contractor's control and responsibility. Maintain remediation and clean up kits to respond to and control spills to the extent possible. The Contractor shall notify the Government of any circumstance that may result in the inability to perform the required services.

> Performance Standards:

- ✓ A copy of the current Government Spill Prevention Control and Countermeasures (SPCC) plan on hand or readily available to the Contractor
- ✓ Contractor Environmental Protection plan on hand and readily available to the Government
- ✓ As applicable, Initial Point of Contact (IPOC) assigned and trained regarding responsibilities
- ✓ As applicable, On Scene Coordinator (OSC) assigned and trained regarding responsibilities
- ✓ One hundred percent compliance with Federal, state, and local environmental laws, regulations, and code
- ✓ Inspect and resupply remediation kits so as to maintain 100 per cent kit stock levels
- ✓ Fuel spills, regardless of size, reported to the COR, NOLSC Petroleum, and DESC
- ✓ Notice of Violation forwarded to the COR

C-2.16 Security

- **C-2-16.1 General**: Under the guidelines of the most current *OPNAVINST 5530.14*, *Navy Physical Security*, the Contractor shall be responsible for implementing the administrative and physical security measures required and necessary to protect Government facilities, vehicles, equipment, materials, systems, and petroleum products, as well as, contractor owned equipment, tools, supplies, and vehicles and products held therein. The Contractor shall provide all labor, vehicles, equipment, materials, and supplies necessary to manage and protect all the areas under its control. The contractor's security plan, the requirement for which is established in <u>Section C-1.4.10</u>, <u>Security Plan</u>, shall outline policy, guidance, and procedures regarding facility access controls and visitor logs, lock and key controls, random patrols of fuel management facilities and pipelines, ADP security, and other measures as may be required and relevant to NAS Patuxent River.
- **C-2.16.2 ADP Security**: The contractor shall comply with all ADP security measures and requirements for Government computer systems. Contract personnel requiring access to the DOD computer systems shall be properly cleared at the level dictated below. Accept for the Government responses to a Contractor's requests for a clearance, the administrative burned required to apply for and process clearances requests and to gain access to computer systems at any level shall be the responsibility of the Contractor.
- C-2.16.2.1 Local FCC Access: Dispatchers and other contract personnel, to include contract management, requiring access to the FAS Fuel Control Center (FCC) systems shall be cleared and provided system access (a password) as dictated by local IT/ADP instructions.
- C-2.16.2.2 FAS Enterprise Server (FES): Persons requiring access to FES (the Purple Hub) shall be cleared and obtain a system password. The Contractor shall complete and submit all specified documentation to obtain the appropriate clearances for each person requiring access to FES. Website http://www.desc.dla.mil/DCM/Files/FESAccess.pdf provides instructions regarding access to FES. To the extent possible and practical, all applicable documentation for all contract personnel that will require access to FES, should be submitted well before the contract start date. Contract personnel will not be granted access to FES or capable of performing contractually obligated tasks until a clearance/password has been provided.
- **C-2.16.3 Physical Barriers**: Except for grounds maintenance and vegetation control around and under installed physical barriers as outlined in <u>Section C-2.12.2.3</u>, <u>Grounds</u>, the Government will provide and maintain the physical security barriers, i.e., walls, fences, lighting, and alarms as may be necessary to protect property; however, se monitoring/reporting of such facilities as outlined below.
- **C-2.16.4 Patrols and Guards**: Except for the personnel requirements noted within this section, contractor furnished security guards are not required.

C-2-16.5 Monitoring/Reporting: The contractor shall perform and document end-of-day facility inspections to ensure all systems are secure to the extent of the physical barriers provided. During the duty hours reflected in Table 1, Hours of Operation, unmanned fuel and cryogenic facilities shall be randomly inspected at least every four hours. Noted facility, physical barrier, and lighting discrepancies shall be reported as are outlined in Section C-2.12, Preventive Maintenance. The Government will perform random after hour drive-by security inspections.

Table 7 Security Measures

Security				
ADP security, user accounts and passwords, obtained for Government computer system users. As applicable.				
Maintain controlled access to Government facilities under the Contractor's control.				
Secure all gates, buildings, facilities, and systems when not in use.				
Establish and maintain a key security and lock control system.				
Maintain visitors logs.				
Perform and document random security checks/patrols.				

> Requirement: In concert with the local vulnerability assessment, the threat condition established, and to the extent of the physical barriers and systems provided, the Contractor shall act to ensure that all Government/Contractor facilities, equipment, materials, supplies, products, and computer systems over which the Contractor maintains control are physically secure. The Contractor shall advise the Government of any circumstance that may result in the inability to perform the required services.

Performance Standards:

- ✓ Level of security comparable to the established threat condition
- ✓ Security plan and requirements documented and files maintained
- ✓ Key and lock system established and controlled
- ✓ Visitor logs maintained
- ✓ Random security inspections performed and documented
- ✓ Facility inspections performed to ensure security systems are functional. Noted discrepancies reported
- ✓ Government computer systems used only by personnel who are cleared and provided password access

C-2.17 Property Inventory and Accountability

C-2.17.1 Joint Inventory: At contract turnover as outlined in Section C-1.5, Contract Turnover, representatives of the Contractor and Government will conduct a joint inventory of all Government furnished facilities, systems, equipment, supplies, and other property to be furnished by the Government to the Contractor. They will jointly validate the list of facilities, fuel and cryogenic systems, equipment, and components listed in Appendixes A, Government Furnished Facilities, and update the appendix to fully account for Government assets to be placed under the care and control of the Contractor. They will also update and jointly validate Appendix B, Government Furnished Equipment, Supplies, and Services to provide an inventory of all other Government furnished minor property.

C-2.17.2 Disposition of Government Property: The Government reserves the right to dispose of any excess or unserviceable facilities, equipment, components, parts, materials, supplies, or other items as may have been furnished at any time over the course of the contract. The Government will replace items critical to the Contractor's performance; however, the Contractor may be tasked under Section C-4.2, Services Requiring a Task Order, to provide replacement items or procure repairs. Furthermore, the Government reserves the right to dispose of any excess or unserviceable common use items such as but not limited to office and rest area furniture, decorative pieces, and appliances such as coffee machines, microwave ovens, and refrigerators without replacement. Appliances and furniture items accumulated, collected, or otherwise provided by the Contractor over the course of the contract shall be removed from the base or otherwise disposed of at the end of the Contract. All facilities, equipment, components, parts, materials, supplies, or other items furnished by the Government to the Contractor shall be returned to the Government in as good a condition as received, allowing for normal wear and tear.

C-2.17.3 Annual Property Inventory: As outlined in <u>Section I, Clause 1114, Government Property (Fixed-Price Contracts)</u>, the Contractor shall account for all properties, maintain records, and submit a report of Government Furnished Equipment/Property in the custody of the Contractor, annually, as of the anniversary of the contract. The report shall be forwarded to the COR not later than 30 days from the anniversary date each year of the contract. The Contractor's report shall provide a complete inventory of Government-furnished property under its custody. The Contractor shall identify all property deleted and received since the preparation of the last inventory and provide copies of source documents, i. e., Contractor/vendors invoices, for each item of Government-furnished property. As applicable, <u>Appendixes A, Government Furnished Facilities</u>, and <u>Appendix B, Government Furnished Equipment, Supplies, and Services</u>, shall be updated by the Contractor.

C-2.18 Use of Government Facilities

- **C-2.18.1 General**: The Contractor shall not permit or authorize its personnel to store, repair, or care for personal property such as boats, motor vehicles, recreational vehicles, trailers, motorcycles, etc., on Government property under Contractor control. Likewise, the Contractor shall not use Government property, facilities, or buildings for the storage or repair of Contractor-owned vehicles and equipment not specified or provided within the terms of this contract.
- **C-2.18.2 Parking:** The parking of personal vehicles used for transportation to and from work will be permitted in designated vehicle parking areas during normal working hours.

C-3.0 CONTRACTOR-FURNISHED EQUIPMENT

C-3.1 Vehicles

C-3.1.1 Standards: The Contractor shall provide all of the vehicles required and necessary to meet the workloads identified herein within the response times outlined in Section C-2.2.2.2, Response, for the petroleum related operations specified in Table 1, Hours of Operation. The equipment stipulated within this section shall be built to the Federal, commercial, and trade specifications outlined and directly or indirectly used and referred to by DOD and other Government agencies in the procurement of the equivalent type of vehicles and equipment. All vehicles and equipment shall be maintained in a fully serviceable condition by the Contractor and shall be fully capable of safely performing the tasks for which they are designed. The Government is fully award that equipment built and configured as specified herein may exceed weight standards for use on "off station" public roads. For the most part, they are commercially available trucks, tractors, and cargo tanks modified to meet specific military demands and maximum deliverable quantities of product to an airfield/flightline environment. In the event any piece of equipment must be taken off station to satisfy a task issued by the Government, the Contractor will be instructed or allowed to obtain the appropriate waivers to operated at full capacity or reduce the cargo load to that level that will fully comply with all Federal and state laws, regulations, and code.

C-3.1.1.1 Configuration: All vehicles provided shall be built to and configured as specified herein. Other than those parts and subparts that are attached by a quick disconnect or a locking type coupler that can be immediately and readily installed by the equipment operator, all equipment, attachments, parts, systems, and subsystems shall be provided with and remain on the vehicle.

C-3.1.1.2 Replacement of Vehicles: The vehicles provided to an activity at contract start shall not be replaced or removed from the base/station without written notification to and documented approval by the Government.

C-3.1.1.3 Standby Equipment: Standby or spare vehicles not specified or required herein but presented for use on station shall pass all inspections applicable to the equivalent type of equipment provided under this contract.

C-3.1.2 Prime Mover, Trucks and Tractors

C-3.1.2.1 General: Truck and tractor chassis, to include motor tank vehicle chassis, provided under this contract shall be of the size, capacity, and condition that provides for an ease of operations fully intended by the truck manufacture, the complete safety of the driver/operator, and one that reflects the pride and professionalism of the Contractor. Truck and tractor chassis shall be of a standard, first class commercial design fully equipped and sized to tow/carry the cargo load to which they will be subjected. Subject to the minimum cargo tank capacity set forth in Section C-3.1.3.2.1, Cargo Tank Capacity, the Contractor shall provide equipment that, when filled to capacity, will, within the military support requirements outlined herein, support the loads being carried. Tractors under 8,000-gallon refuelers shall be configured with three (3) axles rated at 12/20/20 thousand pounds or greater front to rear. 5,000-gallon motor tank trucks shall be configured with three (3) axles rated at 14/20/20 thousand pounds or greater front to rear. Single and dual product 2,000-gallon motor tank trucks used for the transport of ground fuels, aviation gasoline, used oils, and recyclable fuels shall be configured with two (2) axles rated at 10/19 thousand pounds or greater front to rear. Providers of new trucks/tractors shall comply with the most current version of Federal Standard 794*; Truck and Truck Tractor, Medium Commercial for two (2) axle, 2,000-gallon motor tank trucks and Federal Standard 807*; Truck and Truck Tractor, Heavy Commercial for three (3) axle 5,000 and 8,000-gallon trucks or that applicable to the model year the chassis was built; however, alternative engine specifications [215 horsepower rated engines for three (3) axle vehicles and 175 horsepower rated engines for two (2) axle vehicles] and alternative transmission specifications [manual versus automatic] are expectable. Furthermore, as allowed by Section 1.2, Application [both standards], the components listed within the various truck and truck/tractor tables as "standard equipment" are, except as may be required for the safe handling as a fuel servicing vehicle or specified herein and references sited, waived. As outlined in the aforementioned standards, vehicle ratings shall be the manufacture's published ratings. Component and vehicular ratings shall not be raised to meet the requirements of this or any other specification. Except as specifically modified herein, each truck/tractor shall be configured and maintained to meet the requirements set forth in 49 CFR, Chap III, Sub-Chap B, Part 393, Parts and Accessories Necessary for Safe Operation. All tractors of the same size and class shall be interchangeable with all trailers of the same class by the vehicle operator without modification to the tractor or trailer.

- C-3.2.2.2 Safety/Environmental: The Contractor shall maintain trucks and tractors so that entry of carbon monoxide and noxious fumes into the vehicle cab is minimized. Rubber boots around pedals and levers shall be in tact and tight fitting. Grommets in holes through the firewall shall fit snugly. Holes in the floor panels, firewall, or elsewhere within the cab shall be repaired and closed. Heater and fresh air intakes shall be remote from the exhaust discharge. Exhaust systems shall be inspected and repaired or replaced as necessary. Engine oil and fluids shall be controlled (leaks repaired) so as to prevent the spillage of fluids anywhere. Tractor/trailer combination shall be configured with a fifth wheel, tank to tractor frame, bond.
- **C-3.1.2.3 Radios:** The Contractor shall provide the radios described in <u>Section C-3.3.1.1</u>, <u>Radios</u>. The ignition system of all Contractor vehicles shall be equipped with devices designed to minimize radio interference.
- **C-3.1.2.4 Electrical Wiring and Lights:** All wiring beyond the rear of the truck or tractor cab shall be of adequate size to provide the required current-carrying capacity and mechanical strength. It shall be mounted to provide protection from physical damage and contact with spilled fuel by being enclosed in a metal conduit or other oil-resistant protective covering. All circuits shall have over-current protection. Junction boxes shall be weatherproof.
- **C-3.1.2.5 Mirrors and Glass:** All trucks and tractors shall be equipped with large, truck type exterior rear view mirrors located and mounted so as to provide the driver a clear view of the rear along both sides of the vehicle or trailer. Mirrors as well as windshields, windows, turn signals, reflectors, clearance and brake lights shall not be cracked, broken, fogged, or distorted in a way that would impede the driver's vision or prevent a clear signal to other traffic.
- **C-3.1.2.6 Fenders and Mudguards:** Fenders and mudguards shall be installed over the wheels of the tractor to fully protect the cargo tank and pumping system. Front fenders/mudguards may be tractor or trailer mounted. Non-functional skirting and flashing is prohibited.
- C-3.1.2.7 Tires: The Contractor shall install (mount) Non-FOD tires on all aviation fuel servicing equipment. Tires mounted on other trucks/equipment shall comply with 49 CFR, Chap III, Sub-Chap B, Part 393, Sub-Part G.
- **C-3.1.2.8 Exhaust:** The exhaust system of all trucks/tractors shall consist of a standard commercial muffler and a spark arrestor. The spark arrestor shall be approved under <u>USDA Forest Service Standard 5100.1b as supplemented by the NWCG Spark Arrestor Guide, General Purpose and Locomotive (GP/Loco), Volume 1. The spark arrestor shall have a clean out plug. Where flexible exhaust pipe is used to absorb engine torque, a short section, not exceed 18 inches may be used. Exhaust systems shall be configured as follows:</u>

NOTE

A spark arrestor is not required on trucks equipped with turbo diesel engines where 100 percent of the exhaust passes through the turbo unit.

- **C-3.1.2.8.1 Forward Mounted Fuel Components**: On fuel servicing tractor/semi-trailers where fuel system components and piping are mounted on the tractor chassis or on the front of the tank over the tractor chassis, and on cargo tank motor vehicles where components are mounted on the chassis between the cab and the tank or along the chassis under the tank behind the cab, the muffler and spark arrestor shall be mounted at the front of the engine with the exhaust outlet directed toward and exiting at the right extreme of the front bumper of the unit. The exhaust outlet shall point toward the ground at a 45-degree angle and terminate no higher than 18 inches above the ground.
- **C-3.1.2.8.2 Under-Trailer/Rear Mount Fuel Components**: On fuel servicing equipment configured with the system components and piping mounted under the trailer and to the rear of the trailer landing gear or on the rear of the trailer or tank, a shielded commercial exhaust system as described in <u>NFPA 407</u>, <u>Standards for Aircraft Fuel Servicing</u>, may be installed. Exhaust piping, shielded or otherwise, shall not terminal under the truck/tractor cab or anywhere between the chassis frame rails.

- **C-3.1.2.9 Painting and Marking**: Contractor vehicles, excluding utility vehicles, shall be painted and marked in accordance with <u>NAVFAC P-300</u>, <u>Management of Transportation Equipment</u>. All vehicles shall be free of rusted areas, running rust, flaking paint, and excessive paint oxidation. Contractor vehicles shall be completely repainted when touch up painting exceeds 20 percent of the vehicle's surface. Faded, poorly reflective, and obscure stencils, placards, and logos shall be replaced.
- **C-3.1.2.9.1 Placards**: A DOT placard applicable to the grade of product being transported shall be placed on the left quarter of the front bumper. A placard holder or rigid plate to which the placard is mounted may be used for the bumper mounting. See sections applicable to the cargo tank for side and rear placard requirements.
- **C-3.1.2.9.2 Company Logo**: Truck/tractor doors shall be marked with a permanently affixed company name or logo. The name or logo shall be applied in a professional manner, reflective of company pride and professionalism. Stenciled or spray painted logos or magnetic placards shall not be used.
- **C-3.1.2.10 Spill Remediation Kits**: Each Contractor truck/tractor shall be equipped with a 10-gallon spill clean up/remediation kit that is protected from the elements but readily available to the vehicle operator.
- **C-3.1.2.11 Equipment Controls**: Except to operate the clutch, set the transmission in the appropriate gear, and engage the PTO, all pump system controls and effort necessary to observe or operate those controls and the pumping system shall be from the operator position outside the cab of the vehicle being operated. Once the unit is set to operate, the drive shall not be required to re-enter the truck cab except in an emergency or to disengage the PTO and move the equipment from the servicing area.
- **C-3.1.2.12 Spot Light**: Each prime mover shall be equipped with a cab-mounted spotlight (work light) that can be manipulated by the driver from within the truck cab.

C-3.1.3 Refuelers

C-3.1.3.1 General: Contractor provided refuelers, aviation fuel-servicing trucks/trailers and cargo motor tank trucks configured to issue filtered product and defuel and filter product being returned to the cargo tank, shall be configured to meet the specifications outlined herein. The design and construction of new refuelers shall be such that the cargo tank meets DOT 406 specifications; however, cargo tanks built to MC 306 specifications are acceptable. Refueler components shall be applied in accordance with the most current edition of NFPA 407, Standards for Aircraft Fuel Servicing; however, see NAVAIR 00-80T-109, Aircraft Refueling NATOPS Manual, Chapter 11, with regard to the basic components to be installed, their specific range of measurement, and the use of NAVAIR approved components. Furthermore, all cargo tanks and system components through which product will pass, shall be constructed of aluminum or stainless steel. Internally coated tanks and components are not acceptable. Should a conflict between specifications arise, the more stringent or restrictive requirement shall apply. Except for the PTO mounted hydraulic pump, its in-cab mounted controls, and the tractor to trailer electrical, air, and hydraulic lines, all refeuler components shall be contiguous to the cargo tank/frame (semi-trailers), or the entire prime mover/refueler shall be a cargo motor tank truck. A hydraulic cooling system, if installed, may be tractor or trailer mounted. Regardless of the refueler/truck configuration, all hoses and connections, i.e., servicing hoses, recirculation, bottom loading, and defuel connections, overfill protection devices, grounds, deadman controls, or otherwise shall be located on the left or drivers side of the vehicle.

NOTE

The Government reserves the right to designate the grade of product to be held in and dispensed from any or all Contractor fuel servicing vehicles. Reasonable costs associated with product changes, filter replacement for example, directed by the Government will be borne by the Government.

Cargo Tank: Cargo tanks shall be constructed of aluminum or stainless steel. New tank construction shall conform to DOT 406 specifications as outlined in the CFR Title 49, Transportation; however, used cargo tanks constructed to MC 306 specifications are acceptable. Unless otherwise specified, the provisions of 49 CFR 178 and the most current subpart applicable to specification DOT 406 or MC 306 apply. Furthermore, all referenced guidelines for the construction, use of materials, inspections, certifications, marking, and stamping of cargo tanks or components thereof, also apply. The cargo tank shall be one compartment with the appropriate baffles. Each baffle shall be open at the baffle/tank top to allow venting between all baffled areas at the 600 GPM fill rate. Openings at the baffle bottom/tank floor shall allow the flow of lading to the tank suction point at the 300 GPM issue rate. The entire tank shall drain completely to a low point. The tank shall be designed so that all portions are accessible for inspection, cleaning, and maintenance. Each cargo tank shall be marked with a specification and nameplate as outlined in 49 CFR 178. In addition, 49 CFR, Part 180, Subpart A, General, and Subpart E, Qualification and Maintenance of Cargo Tanks shall apply.

NOTE

For clarification, MC 302, 303, or 305 specification tanks will not be considered under this contract.

C-3.1.3.2.1 Cargo Tank Capacity: Trailer and motor tank chassis shall be of a standard, first class commercial design equipped and sized to the maximum extent possible and practical carry the load to which it will be subjected. Cargo tanks provided shall have a minimum capacity of 8000-gallons plus the appropriate expansion space and, unless specified otherwise, shall be filled to capacity. Subject to the minimum cargo tank capacity specified, 8,000-gallon refuelers (trailers) shall be configured with two (2) axles rated at 20/20 thousand pounds or greater, see Section C-3.1.2.1, General, regarding 5,000 motor tank trucks (refuelers). Vehicle ratings shall be the manufacture's published ratings. Component and trailer ratings shall not be raised to meet the requirements of this or any other specification. Equipment required for use or travel off station shall be properly licensed or permitted and loaded to comply with all federal, state, and local highway/road use laws, regulations, and code. In addition, an AVGAS motor tank truck with a tank having a minimum capacity of 2000-gallons plus the appropriate expansion space shall be provided.

NOTE

All fuel servicing trucks and tractor/trailer combinations shall be filled to capacity with JP5/8 or a fluid of equivalent weight and weighed. Certified weight documents and manufacturer's documents regarding weight specifications and limitations of axles shall be presented at the time of the equipment inspection outlined in Section C-3.3.1.2, Equipment Inspection.

- **C-3.1.3.2.2 Sacrificial Devices:** As outlined in 49 CFR 178-345-8 and 346-8, any piping that extends beyond the accident damage protection must be equipped with an emergency stop valve and a sacrificial device such as a shear section. Sacrificial devises in the form of a shear section shall conform to the specifications of Tank Truck Manufactures Association (TTMA) RP 86-98 as tested in accordance with the procedures set forth in TTMA RP 84-98 or the most current version thereof.
- **C-3.1.3.3 Tank Venting:** In addition to pressure and vacuum devices required under specification MC 306 and DOT 406, the cargo tank shall be equipped with a venting system rated at the 600 GPM bottom loading flow rate (100 GPM applicable to the 2000 AVGAS refueler). The system shall open automatically when the unit is set for the movement of product into or out of the cargo tank.

C-3.1.3.4 Overfill Protection: Each cargo tank shall be equipped with an overfill protection device, system or equipment compatible with that installed on the petroleum distribution system (fillstand) at the contracted activity. The refueler connection/receptacle that mates with the fillstand cable/connector shall be firmly mounted near the bottom-loading receptacle and shall be painted green for easy identification. Any wiring between the receptacle and the tank probe shall be encased as required by Section C-3.1.2.4, Electrical Wiring and Lights. Any system installed/used shall be fully functional in the defuel mode and capable of being tested during equipment inspections. For probe type overfill protection systems, i.e., Scully and OPW, a minimum of three portable devices, fully compatible with the tank mounted system, shall be furnished by the Contractor to be used for short-term emergencies. If the contracted activity fillstand system is not equipped with a functional overfill protection device, system, or equipment, the Contractor shall provide fuel servicing trucks equipped with an overfill protection system that is integral to the cargo tank/refueler. That system shall stop the flow of product to the cargo tank completely at the designated full tank level. Regardless of the method used, an anti-drive feature required under Section C-3.1.3.6.1, Bottom Loading, shall be installed.

Note

Internal tank mounting brackets and probes should be adjustable to the extent that potential highway load/capacity restrictions, should they be applied or required, can be accommodated.

Note

The overfill protection systems (receptacles) installed at NAS Patuxent River vary by product dispensed. JP5 trucks shall be configured with the older four prong receptacle, JP8 with the larger 6 prong style.

- C-3.1.3.5 Low Point Drain: The cargo tank shall be configured with an internal self-closing stop-valve at the lowest point(s) of the cargo tank to facilitate low point/complete draining of the tank. Piping/tubing necessary to make the drain point readily accessible without having to crawling under any portion of the vehicle shall be installed and terminate with an additional rigidly mounted control valve. The cable/pull mechanism used to open the self-closing low point drain valve shall terminate at or within easy reach the low point drain outlet but apart from and readily distinguishable from the emergency control system identified in Section 3.1.3.8.3, Emergency Controls, and shall be clearly marked "LOW POINT DRAIN" in a color other than red.
- **C-3.1.3.6 Piping**: System piping shall be designed and installed to facilitate complete drainage of the cargo tank. Piping sections subjected to excessive movement during operation, shall be firmly mounted or braced, and fully protected by grommets where it passes through sheet metal frames or bulkheads. The pump and bottom loading system piping shall be constructed of schedule-40 aluminum or schedule-5 stainless steel.

NOTE

Refuelers configured with permanently installed tank to tractor--tractor to tank product transfer or "belly hoses" will not be considered for use under this contract.

C-3.1.3.6.1 Bottom Loading: Cargo tanks shall be configured to bottom load at 600 GPM (100 GPM applicable to the 2000 AVGAS refueler). The jet fuel bottom loading system shall consist of a standard single point receptacle with dust cover and manual shutoff valve. An anti-drive away device/system, one that will prevent the movement of the unit as long as a nozzle is connected to the bottom-loading receptacle, shall be incorporated in the bottom loading system.

NOTE

In those states requiring vapor recovery, a vapor recovery system shall be installed on refuelers dispensing volatile products, i.e., Jet B, JP4, and aviation gasoline.

- **C-3.1.3.6.2 Recirculation**: All fuel servicing hoses shall be capable of being recirculated. The recirculation system shall be capable of flow rates equal to the size and type of hose system being tested. Product shall be drawn from the main tank valve/suction point, circulated throughout the entire fuel system and hose(s) and returned to the tank at a separate tank fitting remote to the suction point, see <u>NAVAIR 00-80T-109</u>, <u>Aircraft Refueling NATOPS Manual</u>, <u>Figure 11.5</u>. The bottom-loading system may serve as the recirculation point if the return to the cargo tank is remote to the pump suction point.
- C-3.1.3.7 **Defueling**: Each refueler shall be capable of defueling at 50 GPM (25 GPM applicable to the 2000 AVGAS refueler) at ground level. All product defueled shall be metered, filtered, and pass through the relaxation chamber prior to returning to the cargo tank. The defuel connection (stub) shall consist of a one and one-half inch (1½") quick disconnect adapter (male fitting) and dust cap, a one way check valve to prevent inadvertent pressurization of the defuel hose, a line strainer assembly configured to strain incoming product, and a control valve that isolates the strainer and defuel connection. The strainer screen shall be readily removable for cleaning and inspection without interference with or removal of other components.
- C-3.1.3.8 Pumping System: The pumping system shall consist of pumps, piping, connectors, valves, and other hardware identified herein. The pump system shall provide for a low flow rate, 0 to 100 GPM via overwing nozzle, and high flow, 0 to 300 GPM via the underwing (single point) nozzle (0 to 100 GPM applicable to the 2,000 AVGAS refueler). See additional pump rate and hose configuration specifications in Section C-3.1.3.8.1, Performance, below. The pump system shall be adjustable so that fuel pressure measured at the underwing nozzle does not exceed 50 PSI at the 300 GPM rate during aircraft refueling. All system controls, valves, and hose connections shall be accessible to the operator and operable from ground level. All metals downstream of, and including the filter/separator, that are exposed to fuel, shall be non-ferric or stainless steel material. Internally coated piping and components are not acceptable.

Note

Pumping systems using hydraulic pressure, i.e., tractor to trailer pressure systems shall be conspicuously marked with the appropriate "HIGH PRESSURE WARNINGS." Precautions regarding such systems shall be included in operator training programs.

- C-3.1.3.8.1 Flow Control: A calibrated pump pressure gauge, the differential gauges noted in Section C-3.1.3.9.1, Differential Pressure, and a throttle or rate of flow control mechanism that can be set or locked in position shall be centrally mounted outside the truck cab so they can be read/operated from the equipment operator's position. The pump pressure gauge shall be marked to indicate maximum servicing/operating range. It and all other gauges shall be clearly labeled as to their function. All controls shall be illuminated by a panel/frame mounted lighting system conforming to Section C-3.1.2.4, Electrical Wiring and Lights.
- C-3.1.3.8.2 Performance: Except as noted herein and the following note, refuelers shall be capable of dispensing product at the minimum rate of 0 to 100 GPM through a $1\frac{1}{2}$ inch by 50 foot ($1\frac{1}{2}$ " X 50') fuel servicing hose and a $1\frac{1}{2}$ inch overwing servicing nozzle and 0 to 300 GPM through a 2 inch by 60 foot (2" X 60') fuel servicing hose, dry breakaway coupler, 55 PSI hose end pressure regulator, and an underwing (single point) servicing nozzle as measured at the truck meter when connected and returning product to the equipment bottom loading or recirculation point. Pumping systems, thus configured shall be capable of sustained flow at the rates noted until the cargo tank is empty or pump suction/prime is lost. Hose/system flow rates shall be measured separately. (Performance of 0 to 100 GPM through a $1\frac{1}{2}$ inch by 50 foot ($1\frac{1}{2}$ " X 50') fuel servicing hose and a $1\frac{1}{2}$ inch overwing servicing nozzle is applicable to the 2,000 AVGAS refueler).

Note

Three (3) of the 8,000-gallon refuelers shall be configured for and capable of dispensing product at 500 GPM through a pair of 2 inch by 75 foot (2" X 75') hoses coupled by a "Y" adaptor, a dry breakaway coupler, 55 PSI hose end pressure regulator, and an underwing (single point) servicing nozzle. All venting, piping, filter, pump, relaxation chamber, and component applications shall be adjusted to accommodate the 500 GPM flow rate.

C-3.1.3.8.3 Emergency Controls: In addition to the main tank valve control mechanism, the main tank actuator/emergency valve normally positioned at the approximate center of the refueler and opened by the operator to allow the flow of product, emergency shutdown devises shall be installed at the left front and right rear of the cargo tank. These mechanisms shall be unobstructed, i.e., mounted outside of the tank frame, ladders, fire extinguishers, and placards, readily identifiable (handles that may blend with the truck color painted red), and clearly marked EMERGENCY SHUTOFF with directions to PUSH, PULL, LIFT, or CLOSE in two-inch white lettering on a red background. An arrow indicating the direction of motion shall also be provided. Fusible plugs or links incorporated into the emergency shutdown system shall not be painted.

Note

Systems equipped with break off type devises (those that release air pressure to shutdown the system) shall incorporate a means of testing the system during inspections of the equipment and a sealed manual override mechanism so that the unit can be moved in an emergency.

C-3.1.3.9 Filter Separator: A three-stage filter/separator configured with coalescer elements as specified under MIL-F-52308* or meeting American Petroleum Institute (API) Publication 1581, Group II, Class C standards, a separator stage (elements) as outlined by MIL-F-8901*, and fuel monitor elements equivalent to that of MIL-M-81380* shall be installed on each refueler. The non-ferric or stainless steel filter/separator shall be sized to meet the 300 GPM flow rate (100 GPM applicable to the 2000 AVGAS refueler) established in Section C-3.1.3.8.2, Performance, and configured with the appropriate air eliminator, pressure (thermal) relief system, a water slug control valve and test mechanism, a manual sump drain, differential pressure gauges, and a sample connections as specified in NAVAIR 00-80T-109, Aircraft Refueling NATOPS Manual. The air eliminator and pressure relief valve shall be vented to the main tank via a common line and oneway check valve to prevent back flow to the filter vessel. The water slug control valve and sump float assembly shall stop/start the flow of product when the water within the filter/separator sump reaches a predetermined level. The control valve used in conjunction with the float assembly shall include provisions that will permit manual testing of the water slug control system. The filter/separator sump drain shall be equipped with a spring-loaded ball type drain valve that is normally in the closed position. The chamber shall be designed, constructed, tested, marked, and stamped in accordance with the American Society of Mechanical Engineers (ASME) code, ASME Boiler and Pressure Vessel Code, Section VIII, Division 1. The asterisk * following all military specifications indicates there is an Patuxent River revision designator. The latest version shall be used.

C-3.1.3.9.1 Differential Pressure: Three (3) quality pressure differential gauges in the range specified as follows and graduated in one (1) PSI increments shall be installed so that pressure losses across the filter elements (0-25 PSI), the monitors (0-25 PSI), and the entire filter/monitor system (0-30 PSI) can be recorded separately. Each gauge shall be calibrated and set to read at least zero under normal pumping conditions when new filter/monitor elements are installed. The gauge(s) shall be mounted and labeled so as to be readily identifiable and easily monitored by the refueler operator.

C-3.1.3.10 Relaxation Chamber: Each refueler dispensing jet fuel shall be configured with a relaxation chamber, a baffled metal tank within the piping system downstream of the filter/monitor sized to the rated pumping capacity of the refueler. The chamber shall retain fuel within the chamber/tank for 30 seconds after its passage through the filter/monitor system and assure the complete turnover of product. A spring-loaded ball type low point drain valve that is normally in the closed position, accessible to the unit operator without crawling under any part of the truck/trailer, and an air elimination valve/line that vents to the main tank via a one-way check valve shall be installed. The chamber shall be designed, constructed, tested, marked, and stamped in accordance with the American Society of Mechanical Engineers (ASME) code, ASME Boiler and Pressure Vessel Code, Section VIII, Division 1.

- C-3.1.3.11 Meter: Refuelers shall be equipped with positive displacement, temperature-compensating meters capable of the flow rate for the refueler on which it is installed. Meters shall have an accuracy of that stated in the National Institute of Standards and Technology (NIST) Handbook 44. Meters shall be capable of being adjusted while under pressure without leakage or loss of product. Adjustment sensitivity shall be sufficiently fine to permit calibration changes in conformance to the accuracy requirements set forth above. The Contractor shall calibrate or have calibrated by a certified agent each meter semi-annually, after maintenance/servicing, when suspected of being out of tolerance, or when the meter has been damaged. Wire/lead seals shall be affixed to and secure all calibration adjustment devices. The Contractor shall mark each meter to indicate the date of calibration, and shall establish a system of records to validate calibration date markings.
- **C-3.1.3.12 Emergency Dry Breakaway Coupler(s)**: An emergency dry breakaway coupler (a piping to hose coupler that will break dry and allow the servicing unit unencumbered egress) should be installed on each underwing fuel servicing hose at the point where the hose attaches to refueling piping or hose reel.
- C-3.1.3.13 Hoses: All fuel servicing hoses shall be American Petroleum Institute (API) 1529, Grade 2, Type C hoses marked accordingly. Unless otherwise specified, refuelers shall be configured with two hoses, a one and one-half inch by fifty-foot (1½" X 50') overwing hose, and a two-inch by fifty-foot (2" X 50') underwing hose. Where hose lengths in excess of 50 feet are required, a threaded hose connector or dry break coupler may be used providing the connector/coupler will not come in contact with any portion of the aircraft during servicing operations. Hoses shall be free of internal/external electrical bond wires. One and one-half inch (1½") hose, that generally used as a defuel hose, shall be of the hard helix or non-collapsible type. Where two hose assemblies are attached to a common outlet or source of product, a separate control valve shall be provided for and control each hose. Filter and relaxation chamber vent hoses or tubing shall be compatible with the product being handled. A single one and one-half inch by fifty-foot (1½" X 50') overwing hose shall be installed on the 2,000 gallon AVGAS refueler.

Note

The $1\frac{1}{2}$ " OW hose may be configured with $1\frac{1}{2}$ " and 2" dry break couplers and coupled to the refueler by the $1\frac{1}{2}$ " coupler and subsequently used as the defuel hose.

- **C-3.1.3.14 Hose Storage**: Hose storage in the form of troughs, platforms, or hose reels shall be provided for all hoses. Hoses shall not be hung from the tank or frame. The hose storage arrangement shall be such that no sharp bends or kinks occur while hoses are stored. Hoses shall remain stowed when the vehicle is traveling over rough roads.
- **C-3.1.3.15 Hose-End Pressure Regulator (HEPR)**: Refuelers shall be configured with a 55-PSI (maximum) HEPR attached to or as an integrated part of each underwing-servicing nozzle.
- **C-3.1.3.16 Nozzle(s)**: Aircraft fuel servicing nozzles shall conform to the specifications listed herein. Depending on the type aircraft requiring service, two types of nozzles, the underwing or D-1 single point nozzle, the overwing or gravity nozzle shall be installed.
- **C-3.1.3.16.1 Underwing Nozzle**: Nozzle, Pressure Fuel Servicing, Locking, Type D-1 (45° elbow inlet body), the underwing or single point type nozzle, as specified by the most current edition of Military Specification MIL-N-5877 and produced by companies listed in the most resent Quality Products List QPL-5877-XX are approved for use under this contract. Each nozzle shall be connected to the issue hose by a dry break quick disconnect coupler, and shall be equipped with a screen of 60 mesh or finer which is readily accessible without the use of tools. Each nozzle shall have a dust cover.

Note

Additional Type D-2 (straight inlet body) nozzles may be required if significant under wing refueling of commercial wide-body aircraft is required.

- C-3.1.3.16.2 Overwing Nozzle: An overwing nozzle of the non-automated, non-locking type commonly used to dispense aviation fuel to aircraft shall be provided. Each nozzle shall be attached to the issue hose by a dry break, quick disconnect coupler (example) to provide for quick nozzle change and recirculation of product within the hose as outlined in Section C-3.1.3.6.2, Recirculation. The nozzle shall be equipped with a 60-mesh or finer screen installed in the non-flexible nozzle tube/spout. Attachments shall include a dust cap that is held in place by wire and spring system, and a permanently attached flexible bonding wire with a ground clip conforming to MIL-C-83413/7B attached near the end, and terminating with a ground plug conforming to MIL-C-83413/4
- **C-3.1.3.17 Swivels and Hose Couplings**: All swivels and couplings used within the fuel system shall be the greaseless type; however, a light, hand application of grease, non-soluble in petroleum, to bearing races and bearing surfaces, is acceptable. Old, lubricated swivels on which the lubrication channel has been plugged shall not be used. Except as noted throughout this specification, couplings/connections shall be of the permanent, threaded type.
- C-3.1.3.18 Deadman Controls: Refuelers shall be equipped with a hand held deadman control with a connecting hose/cable installed in such a manner that it can be stored on a reel or removed and stowed when not in use. The deadman control hose/cable, located/mounted at the unit control panel, shall be of sufficient length that the operator can reach and monitor all controls, except the remote emergency shut-offs, without letting go of the deadman handle. In the underwing (single point) mode, release of the deadman control handle shall completely stop the flow of fuel within a 5 percent overshoot range (in time or gallons) of the rated capacity of the refueler, i.e., 300 GPM is equal to 15 gallons or 3 seconds.
- **C-3.1.3.19 Static Bonding Cables:** A static bonding cable shall be installed on a rewind reel with cable guide. The overall length of the static bonding cable shall be 50 feet or the length of the longest hose being used whichever is greater. The cable shall be of stranded steel (galvanized or stainless) wire rope 3/32-inch in diameter coated with a petroleum-resistant plastic containing light sensitive dye. The cable shall terminate with a heavy-duty clip conforming to MIL-C-83413/7B and plug, MIL-C-83413/4. Refuelers designated to "hot refuel" shall be equipped with two cable/reel assemblies.
- C-3.1.3.20 Electrical Wiring and Lights: See Section C-3.1.2.4, Electrical Wiring and Lights.
- **C-3.1.3.21 Fire Extinguishers:** Each refueler shall be equipped with at least two fire extinguishers, one on the left (drivers) side readily accessible to the operator at the refueler control panel, the other on the right rear of the unit. Each extinguisher shall have an ANSI rating of not less than 20-B. Halogen extinguishers shall not be used.
- **C-3.1.3.22 Fenders and Mudguards**: Fenders/ mudguards shall be installed over the wheels of the trailer to fully protect the cargo tank, hoses, and other equipment. Nonfunctional skirting and flashing are prohibited.
- **C-3.1.3.23** Tires: See <u>Section C-3.1.2.7, Tires</u>.
- C-3.1.3.24 Painting and Marking: See <u>Section C-3.1.2.9</u>, <u>Painting and Marking</u>, regarding the painting and markings of cargo tanks.
- **C-3.1.3.24.1 Alignment of Stencils**: Reflective stencils as outlined in <u>NAVFAC P-300, Management of Transportation Equipment</u>, shall be applied and positioned in a precise manner. Cargo tank side stencils shall read left to right and be proportionally placed along the horizontal centerline of the cargo tank beginning 12 inches from the front bulkhead/tank weld and ending 12 inches from the rear bulkhead/tank weld. Two line stencils, i.e., NO SMOKING over WITHIN 50 FEET, shall be centered vertically on the horizontal tank centerline. Rear tank stencils reading from top to bottom shall be centered on the vertical tank centerline.
- **C-3.1.3.24.2 DOT Placards:** DOT placards shall be placed on each side of the tank centered on and one inch below the **FLAMMABLE** stencils. A placard shall also be centered (considering lighting placement) on the right half of the rear bumper. A placard holder or a rigid plate shall be used for the bumper mounted placard versus wrapping the placard over/under or around the bumper.

C-3.1.4 Defueler

- C-3.1.4.1 General: The Contractor shall provide defuel truck(s) (single compartment motor tank trucks configured to defuel, take on aviation fuel products generally returnable to stock) shall meet the following specifications. Design and construction of new defuel trucks shall be such that the cargo tank meets DOT 406 specifications; however, cargo tanks built to MC 306 specifications are acceptable. Components shall be applied in accordance with NFPA 407, Standards for Aircraft Fuel Servicing, specifications. Should a conflict between specifications arise, the more stringent requirement shall apply. Except as modified by the following, Section C-3.1.3, Refuelers, applies. Components not specifically addressed do not apply; however, if installed, they shall meet the specification, performance, and configuration standards outline herein.
- C-3.1.4.2 Cargo Tank: See Section C-3.1.3.2, Cargo Tank, and sub-sections thereto. Baffle openings (top vent/bottom flow) may be sized to 100 GPM. The cargo tank shall have a **minimum capacity of 5,000 gallons** plus the appropriate expansion space.
- **C-3.1.4.3 Tank Venting**: See <u>Section C-3.1.3.3</u>, <u>Tank Venting</u> for refuelers; however, venting capacity may be reduced to 100 GPM, the tank fill rate.
- C-3.1.4.4 Overfill Protection: See Section C-3.1.3.4, Overfill Protection.
- C-3.1.4.5 Low Point Drain(s): See Section C-3.1.3.5, Low Point Drain.
- **C-3.1.4.6 Piping**: See <u>Section C-3.1.3.6, Piping.</u> and sub-sections thereto; however, flow rates may be reduced to 100 GPM.
- **C-3.1.4.6.1 Bottom Loading Connection(s)**: In order to facilitate flushing of the cargo tank, defuel trucks shall be equipped/configured for bottom loading at a minimum of 100 GPM via a two and one-half inch (2 1/2") single point pressure fuel-servicing adapter.
- **C-3.1.4.7 Defueling**: Defuel truck(s) shall be capable of metered defueling at 0 to 50 GPM. Product shall re-enter the tank via the piping system, versus the tank top manhole. The defuel connection shall consist of a one and one-half inch (1½") quick disconnect adapter (male fitting) and dust cap, a line strainer assembly, and a control valve that isolates the strainer and defuel connection. The strainer screen shall be readily removable for cleaning and inspection without interference with or removal of other components.

Note

System specifications and flow rates for units designated stand alone "defuelers" are minimums applicable to the defuel process. Any filter systems, flow controls, or other components as may be provided shall meet the equipment standards set forth within this PWS.

- **C-3.1.4.8 Pumping System(s)**: The pumping system shall consist of a pump, piping, connectors, valves, and other hardware identified herein. Pump controls shall provide a flow/defuel rate, 0 to 50 GPM. All controls, valve(s) and hose connection(s) shall be accessible/operable from ground level.
- **C-3.1.4.8.1 Flow Control**: A pump pressure/vacuum gauge and an adjustable locking throttle control shall be centrally mounted outside the truck cab so they can be read/operated from the equipment operator position. The pressure/vacuum gauge shall be marked to indicate maximum servicing/operating ranges. For nighttime operations, all controls shall be illuminated by a panel/frame mounted lighting system. Wiring shall conform to <u>Section C-3.1.2.4</u>, <u>Electrical Wiring and Lights</u>.
- C-3.1.4.8.2 **Performance**: Unless otherwise stated, defuel trucks shall be capable of defueling at a rate of 0 to 50 GPM through a one and one half $(1\frac{1}{2})$ by fifty foot (50) fuel servicing hose. Systems thus configured shall be capable of sustaining the defuel rates noted above until the cargo tank is filled to the overfill alarm.
- C-3.1.4.8.3 Emergency Controls: See Section C-3.1.3.8.3, Emergency Controls.

- **C-3.1.4.9 Meter(s)**: See Section <u>C-3.1.3.11</u>, <u>Meter</u>; however, non-compensated, positive displacement meter(s) with a gallon register shall be installed.
- **C-3.1.4.10 Hose(s)**: Fifty-foot by one and one half inch (50' X 1½") commercial non-collapsible fuel hoses compatible with the specific grade of fuel to be handled shall be provided.
- **C-3.1.4.10.1 Hose End Fittings**: Hose end fittings, i.e., nozzles, tubes, drum thieves, cut hard/soft hose, and any other apparatus as may be required to connect to and defuel the aircraft and equipment assigned shall be provided by the Contractor.
- C-3.1.4.11 Hose Storage: See Section 3.1.3.14, Hose Storage.
- C-3.1.4.12 Nozzle(s): Nozzle, Pressure Fuel Servicing, Locking, Type D-1, an under-wing or single point nozzles, as specified by the most current edition of Military Specification MIL-N-5877 and produced by companies listed in the most resent Quality Products List QPL-5877-XX are approved for use under this contract
- C-3.1.4.13 Swivels and Hose Couplings: See Section C-3.1.3.17.
- C-3.1.4.14 Electrical Wiring and Lights: See Section C-3.1.2.4.
- C-3.1.4.15 Fire Extinguishers: See Section C-3.1.3.21.
- C-3.1.4.16 Fenders and Mudguards: See Section C-3.1.3.22.
- **C-3.1.4.17 Painting and Marking**: See Section C-3.1.3.24 and sub-sections thereto; however, smaller 4 inch on 6 inch versus 6 inch on 8 inch stencils may be used to mark smaller defuel truck tanks.

C-3.1 5 Ground Fuel Delivery Trucks

- C-3.1.5.1 General: The Contractor shall provide ground fuel motor tank delivery trucks (single or multiple compartment tank trucks capable of issuing and defueling ground fuels). Design and construction of new ground fuel trucks shall be such that the cargo tank meets DOT 406 specifications; however, cargo tanks built to MC 306 specifications are acceptable. Components shall be applied in accordance with NFPA 385, Standard for Tank Vehicles for Flammable and Combustible Liquids, specifications. Should a conflict between specifications arise, the more stringent requirement shall apply. Except as modified by the following, Section C-3.1.3, Refuelers, in its entirety applies. Components not specifically addressed do not apply.
- C-3.1.5.2 Cargo Tank(s): See Section C-3.1.3.2 and sub-sections thereto. Baffle openings (top vent/bottom flow) may be sized to 100 GPM. The Contractor shall provide at least one (1) dual product motor tank delivery truck having a minimum capacity of 1,000 (MUP) and 1,000 gallons (JP5) plus the appropriate expansion space and at least one (1) single product motor tank truck having a minimum capacity of 2000 gallons (FS2) plus the appropriate expansion space. See NFPA 385, Standard for Tank Vehicles for Flammable and Combustible Liquids regarding dual product tank separation. Unless specified otherwise, all cargo tanks shall normally be filled to capacity.
- **C-3.1.5.3 Tank Venting:** See <u>Section C-3.1.3.3, Tank Venting</u>; however, the venting capacity for this small unit may be reduced to 100 GPM.
- C-3.1.5.4 Overfill Protection: See Section C-3.1.3.4, Overfill Protection.
- C-3.1.5.5 Low Point Drain(s): See Section C-3.1.3.5, Low Point Drain.
- **C-3.1.5.6 Piping:** See <u>Section C-3.1.3.6, Piping</u>. For ground fuel trucks, system piping may be configured so that product is drawn from (issue) and returned to (fill or defuel) a common point/valve.

C-3.1.5.6.1 Bottom Loading Connection(s): Ground fuel delivery trucks shall be configured for bottom loading at a minimum of 100 GPM. The type bottom-loading adapter will be determined by the grade or class of products to be loaded. Jet fuels used in lieu of diesel fuel shall be loaded through a two and one-half inch (2 1/2") single point pressure fuel-servicing adapter. Diesel fuel and gasoline shall be loaded through a <u>dry-break disconnect adapter</u> assembly (OPW CIVACON KAMVALOK® for example); two inch (2") for diesel fuel and one and one-half inch (1½") for gasoline. Dust caps shall be provided for all systems.

NOTE

In those state, county, and administrative regions requiring it, Stage I and II vapor recovery systems as may be applicable, shall be installed on units/systems designated to handle automotive gasoline (all grades).

NOTE

NFPA 385-90, Section 6-2.12, and all reference to "top-loading" of ground fuel trucks shall be disregarded. Only bottom loading of fuel trucks is authorized.

- **C-3.1.5.7 Defueling:** Ground fuel delivery trucks shall be capable of defueling the product(s) dispensed at a minimum of 25 GPM. Product shall re-enter the tank via the piping system versus the tank top manhole. The defuel connection shall be a one and one-half inch (1 1/2") quick disconnect adapter and dust cover and a control valve mounted at or near the defuel connection for jet fuel or a dry disconnect adapter assemblies as noted in Section C-3.1.3.2.6 for diesel fuel and gasoline. A line strainer, the screen of which shall be readily removable for cleaning and inspection without interference with or removal of other components, shall be mounted at the control valve/dry disconnect adapter.
- **C-3.1.5.8 Pumping System(s):** The pumping system shall consist of a pump, piping, connectors, valves, and other hardware identified herein. Pump bypass/controls shall provide a flow rate, 0 to 25 GPM via a non-automatic overwing or service station type nozzle. All controls, valve(s) and hose connection(s) shall be accessible/operable from ground level.
- **C-3.1.5.8.1 Flow Control:** Clutch/PTO controls and an adjustable throttle control device shall be centrally mounted outside the truck cab so they can be operated from the outside operator position.
- **C-3.1.5.8.2 Performance:** Unless otherwise stated, ground fuel trucks shall be capable of dispensing product at 0 to 25 GPM through a fifty-foot (50') by (state size in inches) hose and overwing or service station type nozzle. Pumping systems, thus configured shall be capable of sustained flow at the rates noted until the cargo tank is empty.
- C-3.1.5.8.3 Emergency Controls: See Section C-3.1.3.8.3; however, the "left front" device may be excluded.
- **C-3.1.5.9 Metering/Measurement Devices**: The following metering/measurement devices or systems shall be installed on the ground fuel truck.
- **C-3.1.5.9.1 Meter(s)**: See Section <u>C-3.1.3.11</u>; however, non-compensated, positive displacement meter(s) with gallon and one-tenth gallon registers shall be installed for each product dispensed.
- **C-3.1.5.9.2 Automated Data Collection**: In addition to the above meter(s), ground fuel servicing trucks shall be configured with a <u>FuelMaster FMU-2525</u>, Mobile Fuel Management Unit. The unit/system shall be configured and maintained to control and store transactions for the grades of fuel dispensed. The Government will provide the unit/system to which the truck transactions will be downloaded.
- **C-3.1.5.10 Hose(s):** Fifty-foot (50') by (state size in inches) commercial fuel hoses compatible with the specific grades of fuel to be handled shall be provided.
- **C-3.1.5.10.1 Hose End Fittings:** Hose end fittings, i.e., nozzles, tubes, drum thieves, cut hard/soft hose, and any other apparatus as may be required to connect to and defuel the equipment and facilities assigned shall be provided by the Contractor.

- **C-3.1.5.11 Hose Storage:** See <u>Section C-3.1.3.14</u>.
- C-3.1.5.12 Nozzle(s): Commercial overwing or service station type fuel nozzles sized to the hose installed and compatible with the specific fuel to be dispensed shall be provided.
- C-3.1.5.13 Swivels and Hose Couplings: See Section C-3.1.3.17.
- C-3.1.5.14 Electrical Wiring and Lights: See Section C-3.1.1.4.
- C-3.1.5.15 Fire Extinguishers: See Section C-3.1.3.21.
- C-3.1.5.16 Fenders and Mudguards: See Section C-3.1.3.22.
- **C-3.1.5.17 Painting and Marking:** See <u>Section C-3.1.3.24</u> and sub-sections thereto; however, smaller stencils, 4 inch on 6 inch versus 6 inch on 8 inch stencils, may be used to mark smaller ground fuel trucks.
- C-3.1.6 Used Oil (Fuel) Truck
- **C-3.2.6.1 General**: Contractor provided used oil (fuel) truck (fuel servicing trucks configured to defuel (potentially an aircraft)/take on used oil products generally not returnable to stock) shall meet the following specifications. Except as modified by the following, Section C-3.2.3.2 applies. Components not specifically addressed do not apply.
- C-3.2.6.2 Cargo Tank(s): See Section C-3.2.3.2 and sub-sections thereto. Baffle openings (top vent/bottom flow) may be sized to 100 GPM. The cargo tank provided shall be a single product tank having a minimum capacity of 2,000 gallons plus the appropriate expansion space.
- C-3.2.6.3 Tank Venting: See Section C-3.2.3.3; however, venting capacity may be reduced to the equivalent of 100 GPM.
- **C-3.2.6.4 Overfill Protection**: A tank overfill device as described in <u>Section C-3.2.3.4</u> shall be installed and operable in the defuel mode.
- C-3.2.6.5 Low Point Drain: See Section C-3.2.3.5.
- **C-3.2.6.6 Piping:** See <u>Section C-3.2.3.6</u>.
- C-3.2.6.7 **Defueling:** Used oil (fuel) trucks shall be capable of defueling products at a minimum of 25 GPM. Product shall re-enter the tank via the piping system, not the tank top manhole. The defuel connection shall be a one and one-half inch (1½") quick disconnect type adapter (male fitting) and dust cap, and a control valve mounted at or near the defuel connection. A line strainer, the screen readily removable for cleaning and inspection without interference with or removal of other component, shall be installed.
- **C-3.2.6.8 Pumping System:** The pumping system shall consist of a pump, piping, connectors, valves, and other hardware identified herein capable of defueling from aircraft, drums, and tanks up to 20 feet below grade at a minimum rate of 25 GPM. Control valve(s) and hose connection(s) shall be accessible/operable from ground level. Each used oil (fuel) truck shall be capable of pumping the entire content of the cargo tank to a used oil tank (fuel)/container via a hose and underwing nozzle assembly.
- **C-3.2.6.8.1 Flow Control:** A calibrated pump pressure gauge, pump suction (vacuum) gauge, clutch/PTO controls, and throttle controls shall be mounted so they can be read/operated from the operator position outside the truck cab. The pressure and vacuum gauge face shall be marked in red to indicate maximum operating ranges.
- **C-3.2.6.8.2 Performance:** Each used oil (fuel) truck set in the defuel mode, with the engine operating within the manufacturer's recommended RPM range, and connected to a source of fuel, shall be capable of the defuel rate noted above.

- C-3.2.6.8.3 Emergency Controls: See Section C-3.2.3.8.3; however, the "left front" device may be excluded.
- **C-3.2.6.9 Meter:** See <u>Section C-3.2.3.11</u>; however, the meter may be a standard non-compensating device.
- **C-3.2.6.10 Hose(s):** Defuel hose(s) shall be non-collapsible one and one-half inch by 50 foot (1½" X 50") hose(s) configured to the source most likely to be defueled of used oil (fuel). A hose fitted with an underwing nozzle (aircraft defuel) or soft (cut end) hose (defuel drop tanks and containers) may be required. The product dispensing and defuel hose may be one in the same but coupled to the unit at different locations.
- **C-3.2.6.10.1 Hose End Fittings:** Hose end fittings, i.e., nozzles, tubes, drum thieves, cut hard/soft hose, and any other apparatus as may be required to connect to and defuel the facilities and equipment assigned shall be provided by the Contractor.
- **C-3.2.6.11 Hose Storage:** See <u>Section C-3.2.3.14</u>.
- **C-3.2.6.9 Nozzles:** See <u>Section C-3.2.3.16</u>. An underwing (single point) nozzle less the hose end regulator shall be installed or available for defueling aircraft of used oil (fuel).
- C-3.2.6.12 Swivels and Hose Couplings: See Section C-3.2.3.17.
- **C-3.2.6.13 Static Bonding Cable**: In that such trucks may be used to defuel an aircraft, see <u>Section C-3.2.3.19</u>; however, dual grounds applicable to "hot refueling" do not apply.
- C-3.2.6.14 Electrical Wiring and Lights: See Section C-3.2.2.4.
- C-3.2.6.15 Fire Extinguishers: See Section C-3.2.3.21.
- C-3.2.6.16 Fenders and Mudguards: See Section C-3.2.3.22.
- **C-3.2.6.17 Painting and Marking:** See <u>Section C-3.2.3.24</u> and sub-sections thereto; however, smaller stencils, 4 inch on 6 inch versus 6 inch on 8 inch stencils, may be used to mark smaller used oil trucks.
- C-3.1.7 Recyclable/Recycled Jet Fuel Truck
- C-3.1.7.1 General: Reserved.
- C-3.1.8 Vacuum Truck
- C-3.1.8.1 General: Reserved.
- C-3.1.9 Utility Vehicles
- **C-3.1.9.1 General**: Utility vehicle(s), pickup or van type equipment and personnel vehicles, as may be provided and used by Contractor management, maintenance, or other personnel within the Contractor organization. Utility vehicles may be painted commercial colors but shall be marked in accordance with <u>Section C-3.1.2.9.2</u>, <u>Company Logo</u>, and shall reflective of the pride and professionalism of the Contractor.
- **C-3.1.9.2 Spill Kit**: Each utility vehicle furnished shall be equipped with a well marked and readily identifiable 10-gallon spill clean up/remediation kit that is protected from the environment but readily available to the vehicle operator.
- C-3.1.10 Prefabricated Building(s)
- **C-3.1.10.1 General**: Reserved.

C-3.2 Records, Inspections and Disposition of Property

- **C-3.2.1 General**: The Contractor shall maintain records; submit to inspections, and dispose of property as outlined in the following sections.
- C-3.2.1.1 Current and Historical Records: The Contractor shall keep maintenance records on all fuel servicing equipment provided. Such records shall contain a complete description, of the truck, tractor, and cargo tank provided, and a copy of cargo tank certification and any applicable inspection documents as may be required by federal, state, and local vehicle code. A complete maintenance history relevant to the Contractor's possession of the vehicle shall be provided and available to the Government for the duration of the contract.
- **C-3.2.1.2 Equipment Inspection**: As outlined in *Section E, Inspection and Acceptance, Clause E29*, four (4) work days prior to the contract start date or a date mutually agreed upon by all parties, the Contractor shall have all equipment, supplies, materials, and documents specified herein available on-site for physical inspection, count, and/or review by the COR of the contracted activity, a representatives of NOLSC Petroleum, and a contracting specialist from the Defense Energy Support Center. The expense of making all such property available shall be borne by the Contractor. A vehicle identification worksheet, Appendix J, shall be completed for each vehicle presented for inspection. Copies of the worksheets and all required attachments shall be provided to the contracting activity and the post-award inspection team leader on the first day of the equipment inspection.
- **C-3.2.1.3 Function and Testing**: An incumbent Contractor providing in place equipment shall be capable of emptying; gas freeing, and disassembling selected equipment/components on request. Unless directed otherwise, an incumbent providing new equipment or a first time Contractor providing new or used equipment shall have all such equipment empty and gas-freed for the initial inspection and shall be capable of disassembling equipment components, as requested. All equipment presented for inspection shall be capable of performing the functions specified, flow rate, deadman control, emergency stop, and overfill protection in the fill and defuel mode for example. All systems shall be capable of being fully tested during the equipment inspection.
- **C-3.2.1.4 Unacceptable Property**: Property deemed unacceptable by the Government shall be repaired, modified as required to meet specifications, or replaced at the Contractor's expense prior to commencement of the contract or on a date mutually agreed to and documented by the COR, NOLSC Petroleum, and DESC within the post award inspection report. Failure by the Contractor to make remedy by the established dates shall result in a formal cure notice. Failure to meet dates established by the cure notice shall constitute grounds for termination/default.
- **C-3.2.1.5 Re-inspection**: As outlined by Clause E29, should it become necessary for the Government to physically re-inspect the equipment, supplies, materials, and documents specified, all costs to the Government, to include but not necessarily limited to those costs applicable to Government travel by the inspection team, shipping/mailing of materials, and/or the movement of equipment, shall be borne by the Contractor.

C-3.2.4 Disposition of Property

- C-3.2.4.1 General: Contractor furnished property identified herein shall be used solely in the performance of this contract and the work defined in Section C-2.0, Specific Tasks. Vehicles and property ordered removed prior to the completion of the contract, removed because it is not capable of performing its designated function, or has becomes of safety/fire hazards, shall be removed from the work site and replaced if applicable at the Contractor's expense. Whatever the case, the lack of serviceable vehicles shall not excuse the Contractor from performing the tasks defined in Section C-2.0, Specific Tasks.
- **C-3.2.4.2 Property Storage**: The Contractor shall not store equipment in excess of contract requirements on Government property. Equipment deemed to be unacceptable for use within the terms of this contract, excess to contract requirements, and standby equipment shall be removed from the base immediately. That property in place at termination of the contract shall be removed from Government property within 30 days. Thereafter, the Contractor may be charged the prevailing commercial storage rate for each piece of equipment remaining on Government property.

C-3.3 Other Contractor Provided Equipment and Supplies

- **C-3.3.1 General**: The Contractor shall provide the following equipment, supplies, materials, and services. In doing so, the Contractor shall adhere to all Federal, state, and local laws, rules, code, and regulations applicable to the products and services provided and the purchase, transport, use, storage, and disposition of hazardous materials that may be required to fulfill the conditions of this contract.
- **C-3.3.1.1 Radios**: The Contractor shall provide intrinsically safe, dual channel (Fuel Dispatch Center/Control Tower), fixed or hands held radios, in sufficient numbers to fully control, simultaneously if necessary, all Contractor fuel and cryogenic operations. A base station, antenna, charging units, if applicable, and all other necessary and required equipment to establish and maintain communication throughout the Contractor's area of responsibility shall be provided. The Contractor shall secure a Fuel Dispatch frequency and gain access to the tower/other frequencies as may be required by Memorandum of Agreement (MOA) with the local/base communications organization, prior to the contract start date.
- C-3.3.1.1.1 Radios for Government Use: The Contractor shall provide the Government 1 hand held radios that will allow the COR/QA to monitor the Contractor's operations. The appropriate battery/radio charging unit(s) shall also be provided to the Government.
- C-3.3.1.2 Telephone Services: The Contractor shall provide all commercial telephone services (voice, facsimile, or data,) and equipment required and necessary to conduct commercial or company business. See Appendix, B, Government-Furnished Equipment, Supplies, and Services, regarding Government-furnished telephones services.
- **C-3.3.1.3 First-Aid Supplies and Equipment**: The Contractor shall provide first aid kits as outline by <u>ANSI Standard Z308.1-1998</u>, <u>Minimum Requirements for Industrial Unit-Type First Aid Kits</u>, for each manned and geographically separated work center, i.e., refueling, storage, direct fuel servicing, etc.
- C-3.3.1.4 Administrative Supplies and Equipment: With the exception of Government furnished forms and equipment specified in Appendix, B, Government Furnished Equipment, Supplies, and Services, the Contractor shall provide all administrative supplies (pen/pencil/paper products) and equipment (computer/fax/copy machines) necessary and required to undertake the administrative and records keeping functions relevant to the contract. The Contractor shall not be given access to or use Government office equipment, i.e., computers and copy machines, not specifically provided for under the terms of this contract. See Appendix, B, Government Furnished Equipment, Supplies, and Services, regarding Government-furnished equipment that may be provided; however, note the provisions of Section C-2.17.2, Disposition of Government Property.
- C-3.3.1.5 Janitorial/Housekeeping Supplies, Equipment, and Services: At those locations for which the Contractor is tasked to perform janitorial services, the Contractor shall provide all janitorial and housekeeping equipment and supplies, to include small trash/waste baskets, self-closing waste containers, and basic personal cleanliness items and restroom supplies, necessary and required to maintain the cleanliness and sanitation of buildings and facilities as may be occupied and used by contract personnel and Government staff. Janitorial services may be sub-contracted.
- **C-3.3.1.6 Tools**: Whether company or individually provided, the Contractor shall ensure that all hand/power tools, test/measurement/calibration devices, and powered/non-powered equipment required and necessary to inspect, test, calibrate, maintain, and repair Contractor furnished vehicles and components thereof are available as needed. Tools required to maintain Government facilities and equipment to the extent required and outlined herein shall also be made available as needed.
- C-3.3.1.7 Spares for Contractor Furnished Equipment: The Contractor shall provide all spares, replacement parts, components, and repair services required and necessary to maintain and repair all Contractor furnished vehicles, structures, equipment, tools, and other items as may be provided by the Contractor. In concert with that objective, the following spares commonly installed on Contractor furnished fuel-servicing equipment shall be stocked (kept physically on hand) for the duration of the contract. The required stocks shall be on hand and validated during the equipment inspection outlined in Section C-3.3.1.2, Equipment Inspections, and inspected as deemed necessary by the COR over the course of the contract.
 - ✓ At least one (1) complete set of each type of filter separator, monitor, and coalescer elements used

- ✓ At least one (1) underwing hose assembly, a 2" X 60' hose for example
- ✓ At least one (1) overwing hose assembly, a 1½" X 60' hose for example
- ✓ At least one (2) quick disconnect coupler
- ✓ At least one (2) hose end pressure regulator (maximum 55 PSI)
- ✓ At least one (2) underwing nozzle

C-3.3.1.8 Spares for Government Furnished Equipment/Facilities: Reserved.

C-3.3.1.9 Consumables, Maintenance: With reference to equipment and facilities operated and maintained by the Contractor, all consumable supplies and materials, to include but not necessary limited to, ground wire, clips, and plugs, lubricants, solvents, sealants and sealant tape, primer, paints and brushes, bulk packaged nuts, bolts, washers, and screws, clamps of all type, bulk control hose and common tubing of all type, and other items commonly used to clean, coat, preserve, lubricate, mark, seal, and secure equipment and components, shall be furnished by the Contractor.

Note

With regard to materials, chemicals, and compounds that may be provided and used by the Contractor, the appropriate Materiel Safety Data Sheet (MSDS) shall be provided by the Contractor and readily available to those that may be required to use or may be exposed to all such materials.

- **C-3.3.1.10 Consumables, Quality Surveillance**: The Contractor shall provide all consumable quality surveillance supplies. Items such as Mason (wide-mouth) jars, sample bottles, solvents and dispensers, cleaning compounds, and other commonly used supplies required and necessary to maintain sampling equipment shall be furnished by the Contractor.
- **C-3.3.1.11 Grounds Maintenance Equipment and Supplies**: The Contractor shall furnish powered and non-powered equipment, i.e., a mover and trimmer, and supplies such as rakes, shovels, wheel-boroughs, disposal bags, and other materials required and necessary to maintain the grounds immediately around buildings as noted in <u>Section C-2.12.2.3</u>, Grounds.
- **C-3.3.1.12 Show Removal Equipment and Supplies**: The Contractor shall furnish all powered equipment, shovels, scrappers, salt compounds, and chemicals required and necessary to maintaining a clear path to, in and around facilities that must be inspected and operated, and around all sidewalk and general building entrances used by the Contractor. Snow and ice removed from designated areas will be accumulated in an area designated for melting or removal by the Government.

C-3.4 Uniforms and Protective Equipment

- **C-3.4.1 General**: Contract personnel shall wear the appropriate uniforms safety equipment required for self-protection.
- C-3.4.1.1 Uniforms: All contract personnel, including site managers, shall wear a distinctive company uniform in performance of their duties. Pursuant to US Department of Labor wage determinations, the Contractor shall provide seasonal uniforms consisting of a shirt and pants or coveralls, a matching seasonal jacket/coat, and a matching baseball type cap (not to be worn on the flightline). Except for distinctive management dress shirts, all contract personnel shall be provided and wear the same type, style, or design uniform. All shirts, coveralls, jackets, coats, and caps shall be emblazoned with a readily identifiable company name or logo. All shirts, coveralls, jackets, and coats shall also have the employee's nametag affixed. Laundry services or compensation for such services shall also be provided as stipulated by the applicable wage agreement/determination. Uniforms material blends equivalent to the Navy work dungarees (65/35 polyester/cotton) or the Marine Corps fatigue uniform (50/50 polyester/cotton), are acceptable. Static producing synthetic materials such as 100 percent nylon, polyester, Dacron, rayon, banlon, and silks, shall not be provided as a uniform or worn as an under or outer garment.

Note

Regardless of the uniform style chosen, cryogenic supervisors/operators as well as the vehicle mechanic may wear protective coverall type uniforms emblazoned as outlined above.

- **C-3.4.1.2 Safety Equipment**: Contract personnel shall wear Personal Protective Equipment (PPE), cranial helmets, safety shoes, and gloves for example, applicable to the task/duty being performed and as mandated by US Navy, station, and unit instructions and regulations.
- **C-3.4.1.2.1 Contractor Furnished Equipment**: The Contractor shall provide its employees with safety equipment such as sound suppression devices and safety goggles. If applicable, other equipment such as fire retardant overalls, safety harnesses and ropes, test equipment for the monitoring of oxygen deficient or explosive atmospheres in confined spaces, and breathing apparatus, shall also be furnished by the Contractor.
- **C-3.4.1.2.2 Government Furnished Equipment**: Special safety equipment used in the performance of direct refueling operations, i.e., cranial protective helmets and signal wands, will, to the extent required to equip contract pit operator, aircraft servicer, fire watch, and plane captain crews, be provided by the Government.
- **C-3.4.1.2.3 Personal Clothing/Equipment**: The Contractor shall ensure that employees adhere to all foot, hand, and eye protection programs and that each employee provides and uses personal clothing and safety equipment such as safety shoes, prescription safety glasses, and gloves.

C-4.0 LOGISTICS SUPPORT, COST REIMBURSABLE

C-4.1 Cost Reimbursement

C-4.1.1 General: As outlined above, the Contractor shall provide all services, equipment, supplies, and materials not specified as Government provided elsewhere within this contract or as directed by the COR. However, the Government reserves the right to accomplish any and all maintenance beyond that of preventive and operator maintenance using government assets, labor, or other contracts. Furthermore, the Government reserves the right to purchase any equipment items, supplies, or materials described herein when the Contracting Officer determines it is in the best interest of the Government. That right includes that of tasking the fuel management Contractor. Given a task, the Contractor will be reimbursed as follows:

C-4.1.2 Reimbursement for Allowable, Allocable, and Reasonable Cost

- **C-4.1.2.1** Goods and Services: Reimbursement under Section C-4.2, Services, Requiring a Task Order, shall be for the prime Contractor's allowable, allocable, and reasonable direct cost of any subcontracts for furnishing such equipment, supplies, and services as specified.
- **C-4.1.2.2 Labor**: Reimbursement under <u>Section C-4.3</u>, <u>Augmentation</u>, shall be for allowable, allocable, and reasonable directed labor costs plus fringe benefits and payroll taxes of the prime Contractor's regular employees. Allowable, allocable, and reasonable cost will be reimbursed pursuant to applicable FAR clauses.
- **C-4.1.2.3 Non-Reimbursable Costs**: The Contractor shall not be reimbursed under either section for the cost of labor associated with the use of its employees during normal work hours in the performance of any task listed herein. Nor will the Contractor be reimbursed for equipment costs using Government or Contractor-furnished equipment in the performance of any task listed herein.
- **C-4.1.3 Allocation of Costs**: The Contractor shall ensure that the costs for preventive and operator maintenance are included in the appropriate CLIN on a firm-fixed price basis. The Contractor shall ensure that any associated indirect/overhead cost, if any, related to the performance of tasks under Sections C-4.2, Services Requiring a Task Order and C-4.3, Augmentation (except as otherwise specified hereinafter) are also included in the appropriate CLIN on a firm fixed price basis. Those associated costs shall include, but may not necessarily be limited to, the costs of office supplies, salary for a purchasing agent considered necessary by the Contractor, and other indirect/overhead costs considered a part of operating the fuel system. Any reference to reimbursement for indirect/overhead costs is not applicable to the reimbursement of costs of the prime Contractor under this contract. In addition, Sections C-4.2, Services Requiring a Task Order and C-4.3, Augmentation shall be non-fee bearing. Therefore, references to reimbursement for fixed fee are not applicable to the reimbursement of costs of the prime Contractor under this contract. The Contractor shall provide the following:

C-4.2 Services Requiring a Task Order

C-4.2.1 Contractor Purchasing System

- **C-4.2.1.1 General**: The Contractor shall establish and maintain a purchasing system acceptable to the Government and shall comply with the following minimum requirements.
- C-4.2.1.1.1 Standard Operating Procedure: The Contractor shall prepare a Standard Operating Procedure (SOP) regarding the Contractor's purchasing policies and procedures. The SOP shall include, but will not necessarily be limited to, policy and procedure regarding emergency purchases, subcontracting, termination of contracts, source selection, contract administration, and the maintenance of purchasing records and files. The Contractor shall submit a draft of the SOP to the DESC Contracting Officer, DESC-FPB, to arrive no later than 45 days prior to the contract start date. On review and acceptance, a copy shall be provided to the COR. Thereafter, the Contractor shall adhere to established procedures for the duration of the contract.
- **C-4.2.1.1.2 Qualified Companies**: The Contractor shall purchase materials and services only from those companies qualified and normally engaged in the type of repair activities required or those that provide or manufacture the materials needed.

- **C-4.2.1.1.3 Quotes**: Except for purchases of \$2,500 or less, a minimum of three quotes (verbal or written) shall be obtained. The award shall be to the lowest, responsible, responsive bidder. Regardless of dollar value or urgency, the Contractor shall withhold award until it has determined that the price is fair and reasonable. Documentation regarding this determination shall be included in the task order file.
- **C-4.2.1.1.4 Price**: The Contractor shall procure supplies, materials, and services at the most advantageous prices with due regard for prompt delivery, credits, and other benefits as may be available. The Contractor shall take all actions necessary to obtain applicable tax exemptions, price reductions, discounts, and refunds. Reimbursement to the Contractor will be for net cost or price less discounts, rebates, allowances, credits, tax exemptions, reductions, refunds and other benefits, any or all of which shall be fully documented.

C-4.2.2 Maintenance and Repair by Task Order

- **C-4.2.2.1 Requirement to Perform**: The Contractor may be directed by the COR to provide for, or may report to the Government the need for, maintenance and repair services beyond the scope of preventive and operator maintenance outlined herein. On notification of a requirement to perform a specific maintenance task or reporting such a requirement to the Government and being directed to perform, the Contractor shall:
- **C-4.2.2.1.1 Writing Description**: Provide a complete written description of the deficiency or the nature of the wear, breakage, or damage to the system needing repairs. This document should include a detailed description of the system requiring maintenance or repair, the specific components needing repair, replacement, or adjustment, and a preliminary list of parts and materials required.
- **C-4.2.2.3 Determination**: Determine whether the work will be accomplished in house (by the Contractor) or be subcontracted.
- **C-4.2.2.3.1 In House Work**: If the work is to be accomplished in house, provide a complete list of parts, components, materials, and equipment not provided under the contract, the source of supply, and an itemized cost breakdown to include labor, if applicable or allowed. Also, establish a performance period or get well date.
- **C-4.2.2.3.2 Out Sourced Work**: If the work is to be accomplished by subcontract, provide the cost estimates as outline above. As with an in house estimate, all subcontractor estimates shall include a complete list of parts, components, materials, equipment, and labor, and an itemized cost breakdown thereof. Any subcontract shall also establish the performance period or get well date.
- **C-4.2.2.4 Funding/Order to Perform**: The Government will determine the availability of and provide funding. Given the approval to proceed, the Government will provide a written task order. The Contractor shall take no action to perform maintenance or repairs outside the scope of the contract until such time a written task order has been provided by the COR.

C-4.3 Augmentation

C-4.3.1 General: Augmentation is defined as compensation for any unscheduled work that falls outside the normal operating hours outlined in <u>Table 1, Hours of Operation</u>, and for which service personnel must be retained beyond normal duty hours or called to duty to supplement the assigned workforce. Actions directed by the Government or taken by the Contractor that do not result in additional labor (added personnel) or extended hours of operation will not be considered augmentation hours. For example, increased sampling within established duty hours or the continued manning of bulk storage during normal duty hours to observe and assist a third party maintenance contractor is not be considered augmentation.

- **C-4.3.2 Augmentation Authority**: The Commanding Officer, NAS Patuxent River, will specify the person(s), position, or office authorized to approve augmentation and the means by which the approval will be documented. Except as provided herein, all augmentation shall be approved prior to retaining employees or calling additional personnel to work. Copies of the augmentation approval form/log, the dispatch log validating the circumstances for augmentation, and the individual(s) time card that shows the hours worked, shall support all invoices for augmentation. Unless specifically tasked by the Government and approved by the appropriate authority, extended hours for personnel such as mechanics, accountants, and administrative personnel do not qualify as augmentation. Failure to relieve personnel at the end of a normal shift for which there are available oncoming personnel or because scheduled personnel fail to show shall not be considered augmentation time. Furthermore, the recall or retention of personnel with specially licenses, i.e., a CDL holder, to undertake an infrequent but contracted function, shall not constitute augmentation.
- **C-4.3.3 Conditions**: Augmentation will be granted only under the following conditions. Each paragraph is coded (A) to indicate automatic approval within the parameters defined or (P) to indicate pre-approval is required.
- **C-4.3.3.1 No Oncoming Relief (A)**: For any aircraft fuel servicing operation in progress, e.g., the nozzle is connected and fuel is flowing, at the end of normal operating hours for which there is no oncoming/relief shift. Subsequent servicing requests, any beyond that in progress, shall be approved as outlined in <u>Section C-4.3.2</u>, <u>Augmentation Authority</u>.
- **C-4.3.3.2 Continuous Receipt (P)**: For continuous receipt operations, a continuous pipeline receipt for instance, that will extend beyond the operating hours defined in Table 1, Hours of Operation, Bulk Fuel Storage.
- **C-4.3.3.3 Mutual Agreement (P)**: As mutually agreed to by the Contractor and the approving authority to provide services during unscheduled weekend operations such as make-up flight schedules. The specific hours of planned augmentation and manning levels shall be documented as noted above.
- **C-4.3.3.4 Emergency** (**P**): Work authorized by the designated local authority to undertake emergency fuel servicing operations; a downed aircraft recovery operation for example. The circumstances shall be fully documented.
- **C-4.3.3.5 Time Worked**: Unless locally established policy or union agreement dictate otherwise, compensation shall be paid for the actual hours worked plus reasonable travel time for individuals that may be called to return to duty.

Appendix A Government Furnished Facilities

The following is a list of Government facilities and components thereof that will be put under the care and control of the Contractor. It includes items that must be monitored, inspected, and requires preventive maintenance as specified throughout this PWS. Small components such as valves and flow indicators of less than 1.5 inches for which there is no specific PM schedule are not listed. This and the component/PM summary page that follow are approximations that shall be validated and updated as outline in Section C-2.17, Property Inventory and Accountability.

Facility	Item/Component Description (1)	Qty
2622	Contractor Office and Maintenance Building	3,200 SF
	Managers Office	
	Dispatch/Drivers Ready Room	
	Refueler Maintenance Area	
502	Cryogenics Facility, Two Story, 23' X 42'	966 SF
	First Floor Office, 10' X 12'	120 SF
	First Floor Converter/Cylinder Storage Area, 22' X 30'	660 SF
	First Floor Workroom, 11' X 11'	110 SF
	Lower Floor Converter/Cylinder Storage Area, 40' X 21'	840 SF
	Lower Floor Head, 5' 6" X 10'	56 SF
	Lower Floor Storage Room, 7' X 8'	56 SF
	Outside Covered Storage Area	? SF
	LOX Tank, 2000 Gallon Vertical	2
	LOX Tank, 1500 Gallon Vertical	1
	LOX Tank, 500 Gallon Horizontal	1
	LN2 Tank, 2000 Gallon Vertical	3
	LN2 Tank, 500 Gallon Horizontal	1
	Converter, LN2	1
	Service Hose, Steel, 10'	4
	Service Hose, Aluminum, 10'	1
	Service Hose, Steel, 15'	1
	Drip Pan, 4"	3
	Drip Pan, 10"	2
	Sampler, LOX	2
<u> </u>		
		1

Facility	Item/Component Description (1)	Qty
2199	Direct Refueling Facility	
	Tank, 30,000 Gallon, Horizontal Cylindrical	1
	Valve, General Twin Seal, 8'	1
	Valve, General Twin Seal, 6'	2
	Valve, Thermal (Pressure) Relief	12
	Valve, Butterfly, 6'	15
	Gauge, Pressure,	11
	Strainer Assembly, In Line Duplex	1
	Meter, Temperature Compensated	2
	Valve, Butterfly, 4"	4
	Filter Separator, 600 GPM	4
	Gauge, Differential Pressure, Gamon	4
	Valve, Thermal (Pressure) Relief	4
	Fuel Monitor, 600 GPM	2
	Gauge, Differential Pressure, Gamon	2
	Valve, Thermal (Pressure) Relief	2
	Pump Motor, Siemens, 75 HP	2
	Pump, Union, 600 GPM	2
	Fuel Recovery Tank, 250 Gallon	1
	Show/Eyewash Assembly	1
	Drain, Low Point, 11/2' Ball Valve/Coupler Assembly	2
	Valve, Ball, 8'	2
	Pantograph, 5 X 20' Section	1
	Hose Assembly, 4" X 10'	1
	Nozzle, D-1	1
	Deadman Control	1
612	Service Station, 10' X 15" (With Head) Cinderblock	150 SF
	Tank, 12,000 Gallon Horizontal Underground	1
	Tank, 5,000 Gallon Horizontal Underground	2
	Pump, Service Station, 6 GPM, Dual Hose	4

^{(1).} Provide a complete and accurate description, i.e., item, manufacture, model number, size, rating, and other descriptive information, of the system components. Indented lines indicate the item or component is a sub-assembly of the item above.

⁽²⁾ Use an empty parentheses () to indicate unknown factors, i.e., facility numbers, make/manufacture, GPM or PSI ratings, etc.

Summary of Facilities, Components, and PM Requirements						
Item	C	D	W	M	SA	A
Tank, Aboveground Steel, Cone Roof						
Tank, Aboveground Steel, Floating Roof						
Tank, Aboveground Steel, Horizontal Cylindrical						
Tank, Aboveground, Vaulted (All Types)						
Tank, Underground, Cut & Cover (Steel or Concrete)						
Tank, Underground Steel, Horizontal Cylindrical						
Tank, Below Ground, Vaulted (All Types)						
Berm/Containment Systems						
Valve, Berm Drain (All Types)						
Pipeline, Aboveground (Linear Feet, All)						
Pipeline, Underground (Linear Feet, All)						
Pit, Component and Piping						
Buildings/Structures (Used/Controlled by the Contractor)						
Fire Protection/Suppression System						
Shower & Eye Wash						
Roads and Paved Surfaces						
Fences and Gates (Linear Feet/Number)						
Lighting Systems						
Cathodic Protection System						
Filter Separator						
Differential Pressure Gauge						
Pressure Gauge						
Valve, Pressure/Thermal Relief						
Air Eliminator Assembly						
Fuel Monitor						
Differential Pressure Gauge						
Pressure Gauge						
Valve, Pressure/Thermal Relief						
Air Eliminator Assembly						
Relaxation Chambers						
Pressure Gauge						
Valve, Pressure/Thermal Relief						
Air Eliminator Assembly						
Pump						
Pump Motor						
Reduction Gear						
Strainers (All Types)						
Meters		1				
Meter Register		<u> </u>				
Temperature Compensator		<u> </u>				
Set Stop Devise		<u> </u>				

Summary of Facilities, Components, and PM Requirements						
Item	С	D	W	M	SA	A
Gauges, Pressure						
Gauges, Differential Pressure						
Valve, Ball						
Valve, Butterfly						
Valve, Double Block & Bleed						
Valve, Gate (All Types)						
Valve, Globe						
Valve, Lubricated Plug						
Valve, Non-Lubricated Plug						
Valve, Thermal/Pressure Relief						
Valve, Flow Control						
Valve, Pilot						
Valve, Pressure Relief						
Valve, Fire Control (Fusible Plug)						
Valve, Check/One Way						
Motor Operator (Valve)						
Hose Assembly, Pier Receipt						
Loading Arms, Pier Receipt						
Pantograph						
Hose Assembly						
Emergency Dry Breakaway Couple (HDBC)						
Quick Disconnect Coupler						
Nozzle, Single Point/Underwing						
Hose, Fuel Servicing (All Sizes)						
Coupler, Quick Disconnect						
Nozzle, Single Point/Underwing						
Deadman Control Assembly						
Ground System/Indicator						
Ground Wire/Clip/Plug						
		1				
		1				
		1				
		1				
		1				
		1				
		1		1		

Codes: C = Continuously observed or monitored during operation. D = Daily, W = Weekly, M = Monthly, SA – Semi-Annual, A = Annual.

Appendix B Government Furnished Equipment, Supplies, and Services

In addition to the facilities and components listed in <u>Appendix A, Government Furnished Facilities</u>, the Government will provide the following equipment, supplies, and services to and for the use by the Contractor.

<u>Fire Suppression Equipment</u>: Except for Contractor furnished extinguishers mounted on the Contractor furnished fuel servicing trucks, all fire suppression equipment, i.e., fire extinguishers or portable/installed fire suppression equipment, will be provided, repaired, overhauled, and, as necessary, replaced by the Government. The Government will establish the quantity and type of fire suppression equipment on station within the Fuel Management facilities.

<u>Telephone Services</u>: The Government will provide telephone services, i.e., commercial, DSN, and on-station emergency lines, Local Area Network (LAN) connections (if applicable), and equipment required and necessary to conduct Government business, i.e., FAS/FES input. See <u>Section C-.3.3</u>, <u>Other Contractor Provided Equipment and Supplies</u>, regarding Contractor-furnished telephones services.

<u>Utilities</u>: The Government will provide electricity, natural gas/propane, heating/power production fuels, water, and sewage services as required for the health and welfare of contract personnel that occupy facilities provided by the Government and prefabricated structures provided by the Contractor under <u>Section C-3.1.10</u>, <u>Prefabricated Buildings</u>.

<u>Custodial Service</u>: The <u>Contractor shall</u> provide custodial services to the extent provided in the Installation Custodial Contract for facilities provided.

<u>Refuse Collection</u>: The Government will provide refuse collection. Refuse placed in refuse containers by the Contractor shall be limited to that generated at the contracted location in the performance of this Contract.

Grounds Maintenance: The Government will provide grounds maintenance, except for those grounds maintenance taskings specified.

Emergency Medical Service: The Government will provide the emergency medical service limited to first responder emergency medical services as available. A Navy ambulance will respond to called emergencies and transport injured employees to the closest medical facility.

<u>Postal/Mail Distribution</u>: The Government will provide access to and postage for the United States Postal Service and United Parcel Service for official Government mail generated as a result of performance of this Contract. The Government will also provide on-installation distribution of mail.

<u>Fuel Products</u>: Limited to those products stocked and issued on base, the Government will furnish fuel for the operation of the Contractor's fuel servicing equipment, trucks, and tractors identified as fuel servicing equipment. The Contractor shall provide fuel for utility/administrative vehicles, i.e., pick-ups and vans, used by management for administrative purposes.

<u>Forms and Documents</u>: The Government will provide all forms and documents unique to the Government.

<u>Materiel Safety Data Sheets (MSDS)</u>: The Government will provide the appropriate MSDS for those compounds furnished by the Government. See <u>Section C-.3.3</u>, <u>Other Contractor Provided Equipment and Supplies</u>, regarding materials provided by the Contractor and the requirement to provide the appropriate MSDS for those materials.

The following is a list of additional Government minor property that will be put under the care and control of the Contractor. It includes items that must be secured, monitored, inspected, and may require preventive maintenance as specified within this PWS. This is an approximate list to be validated and updated as outline in <u>Section C-2.17</u>, <u>Property Inventory and Accountability</u>.

Facility	Item/Component Description (1)	Qty
	Fuels Automated System (FAS) Equipment (Show serial numbers)	0
	Computers	0
	Keyboards	0
	Mouse/Roller Ball	0
	Monitors	0
	Printers	0
	Modems	0
	APC Devise	0
	Bar Code Scanner	16
	NSWC Dahlgren	
	Fuel Servicing Truck, 2,000 Gallon	1

⁽¹⁾ List item, manufacture, size, rating, and other descriptive information. Supplies stocked and controlled by the Government then issued to the Contractor, need not be listed. ²⁾

Appendix C Definitions, Acronyms, and Abbreviations

Words, the use of words, phrases, abbreviations, and acronyms as may be reflected within this Performance Work Statement are defined and clarified as follows. It is a generic listing. Many of the entries herein may not appear in this specific PWS and should be regarded solely as general information.

AFSS: Automated Fuel Service Station

API: American Petroleum Institute

AT: Annual Tour. Term applicable to Air Force Reserve annual reserve training activities.

ATG: Automatic Tank Gauge

AST: Aboveground Storage Tank

ASTM: American Society for Testing and Materials

Barrel: A barrel is equal to 42 U.S. gallons.

Biodiesel: Fuel Oil, Diesel, Biodiesel B20, a mixture of diesel fuel and organic oil such as soybean oil.

Caretaker Status: Caretaker status denotes a facility where all piping, hoses, loading arms (pantographs), storage tanks, and related equipment in the facility are completely free of oil or hazardous materials, where the components have been certified as being gas free, where piping, hoses, and loading arms (pantographs) have been blanked, and where the facility has been posted as being in caretaker status.

CFE: Contractor Furnished Equipment

CFR: Code of Federal Regulations

CLIN: Contract Line Item Number

Common Hand Tools: As it applies to this document, common hand tools are defined as screwdrivers, pliers, hand cutters, hand, Allen, and pipe wrenches, socket and nut driver sets, hammers, bars, clamps and securing devises, and miscellaneous other non-powered tools of all size and type as may be carried by (personal tools) or available to (shop tools) a system operator or maintenance person performing simple and immediate adjustments and repairs.

Contract Date/Periods:

Contract Award Date: The date entered in block 20C, Date Signed, of the Standard Form 26, Award/Contract. This date may differ from the start/performance date. Note that elements of the solicitation/contract are linked to this date.

Contract Start Date: The contract start date, performance date, or first day of the performance period is the first day of the period cited in block 15 (A through F) of the Standard Form 26, Award/Contract. The start date and performance period may be adjusted by amendment to provide the Contractor sufficient lead-time to ready equipment for the contract. In this respect, the award and start dates are linked dates in that one may drive actions of the other.

Contract(ed/ing) Activity: Any reference to the "contracted" or "contracting" activity is reference to the base, facility, activity, or installation for or to which the PWS applies.

Contractor (**The**): The individual, group of persons, company, group of companies, or corporation specifically named and contracted by/with the Government to fulfill the terms of the specified contract document. The term "Contractor" as used herein refers to the company or corporation as a whole or any individual, manager or assistant, attendant, technician, operator, driver, dispatcher, or laborer who may be acting on behalf of the named Contractor.

Contracting Officer: Includes the Procurement Contracting Officer (PCO) and the Administrative Contracting Officer (ACO).

Contracting Officers Representative (COR): The local or on site Navy technical specialist, military or civilian, designated by the Contracting Officer to inspect and accept or reject the supplies and services furnished under a specified contract.

Cut and Cover (Tank): The type of bulk storage tank common to the early 1950's and NATO that was constructed at or partially below ground level and then covered with protective layers rock, gravel, and earth. Pits, pumping equipment, and pump houses are normally atop the tank.

DESC: Defense Energy Support Center

DFAMS: Defense Fuel Automated Management System

DFR: Defense Fuel Region

DFSP: Defense Fuel Support Point

DiEGME: Diethylene Glycol Monomethyl Ether, a type of Fuel System Icing Inhibitor (FSII)

DLA: Defense Logistics Agency

DOD: Department of Defense

DODAAC: Department of Defense Activity Address Code (also see UIC)

DSN: Defense Switching Network (telephone communications system once referred to as AUTOVON)

EDP: Emergency Distribution Plan

EPA: Environmental Protection Agency

EGME: Ethylene Glycol Monomethyl Ether, a type of Fuel System Icing Inhibitor (FSII)

FAR: Federal Acquisition Regulations

FAS: Fuels Automated System

FES: Fuels Enterprise Server

FSII: Fuel System Icing Inhibitor

ISSA: Inter-Service Support Agreement

Grade Code: Standard codes as outline in NOLSC Petroleum Notice 4265, Revised DOD Standard Prices and Pricing guidance for Petroleum Products (Cognizance 9X and 1B Materials). The use of "X" as in LSX indicates a seasonal use of similar products of similar codes, i.e., LS1 and LS2, Low Sulfur Diesel fuel.

GFE: Government Furnished Equipment

Government, The: The Contracting Officers Representative (COR) or any other person, office, unit, or base acting collectively on the part of, employed or retained by, acting on behalf of, and given authority by the Government of the United States.

JTR: Joint travel Regulations

Maintenance: Unless specifically defined otherwise, the word or term "maintain or maintenance" shall mean preventive or operator maintenance as defined below.

Operator Maintenance: Operator maintenance is that work accomplished during routine inspections and during system use/operation. Operator maintenance may be, but is not necessarily limited to, work such as the replacement of ground wires, plugs, and clips, the replacement of O-rings and gaskets, the tightening of nuts, bolts, and screws to prevent leakage, or corrosion control and spot painting. Operator maintenance is normally be limited to those actions taken by qualified system operators using common hand tools.

Preventive Maintenance (PM): Preventive maintenance is a program of recurrent periodic or cyclic scheduled work designed to preserve and maintain equipment, apparatus, or facilities in such condition that they may be effectively used for their intended purpose.

Other Maintenance and Repair: Maintenance and repair beyond that defined as preventive is other maintenance and repair. This includes unplanned repair or replacement of material or components that show abnormal wear or fail. This maintenance will be approved by the COR and is reimbursable under Section C-4.1.

Maintenance "Not requiring component tear-down" implies that whatever action is stated, "replace an O-ring" for instance, does not require that the component be removed from the system or disassemble (major maintenance) and that the replacement of the O-ring is a simple slipped in or over or that a retainer ring can be moved, removed, and replaced (PM or operator maintenance) with no more than a simply hand tool.

MILCON: Military Construction

MPMS: Manual of Petroleum Measurements Standards

MSDS: Material Safety Data Sheet

MRE: Maintenance, Repair, and Environmental

NFPA: National fire Protection Agency

NPDES: National Pollution Discharge Elimination System

NOLSC DC: Naval Operational Logistic Support Center, Washington DC, referred to as NOLSC Petroleum

NSN: National Stock Number

OPA: Oil Pollution Act

OSHA: Occupational Safety and Health Administration

Phase IIB: The inclusion of ground fuels into the DESC DFAMS management and reporting system.

PM: Preventive Maintenance (see Maintenance above)

POS: Peacetime Operating Stock

PSI: Pounds per Square Inch

PWC or D: Public Works Center or Department

PWS: Performance Work Statement

Response Time: The total elapse time as measured from the time a call for services is received by the Contractor to the time the fuel servicing equipment or operator arrives at the aircraft, vehicle, facility, or equipment to be serviced. Note that there are varying "normal duty hour" and "after hour or weekend" response times.

QASP: Quality Assurance Surveillance Plan

SOP: Standard Operating Procedure

SOW: Statement of Work

SPCC: Spill Prevention Control and Countermeasure Plan

TAFDS: Tactical Airfield Fuel Delivery System, a set of pumps, filters, bladders, connecting hoses, and components used to receive, store, and dispense fuel to aircraft under field conditions.

Time: All reference to time or time periods, i.e., 0600-2000, 0600 to 2000, or 0600 to 2000 hours, is an expression of time as measure by a 24-hour clock (military time) and is an expression of local time for and at the contracted location.

UDAPS: Uniform Data Automated Processing System

USCG: United States Coast Guard

UST: Underground Storage Tank

UTA: Unit Training Assembly. Term applicable to Air Force Reserve weekend training.

Wording: Word usage and the intended meaning with regard to this solicitation/contract are as follows:

"Shall" is used to indicate that a provision of the contract or a requirement/action specified of the Contractor is mandatory. "The Contractor shall," identifies a mandatory action on the part of the Contractor.

"Should" is used to indicate an action on the part of the Contractor is recommended. "Emergency dry breakaway couplers should be installed," implies a recommended action or option on the part of the Contractor.

"Will" is used to indicate futurity on the part of the Government. "The Government will provide," implies the Government to take some future action to make something available to the Contractor.

"Furnish" and "provide" are use interchangeable.

"Herein" as use within this document refers to the Performance Work Statement (PWS) document and attached exhibits, in total.

"**Immediate**" as used herein implies that an action specified will be the next action, task, movement, or accomplishment taken on the part of the Contractor or contract employee to which action is directed.

"Notes" Notes are used to emphasize specific requirements, practices, and procedures required of the Contractor.

"Therein" as used within this document refers to the policy, procedure, guidance, information, data, or other information contained within a referenced document or an area of the PWS other than that being read.

The use of "and/or" and the forward slash "/" between words, i.e., collection/delivery, means or implies a capability to carry out either or both of the actions or activities described.

The terms "fuel" and "petroleum" may be used interchangeability.

Appendix D Reference Documents

The following is a list of the references directly/indirectly sited within the PWS. It is not all-inclusive and does not site local/command instructions. It is the responsibility of the Contractor to ensure full compliance with all Federal, state, USN/USMC, and local regulatory documents. On contract award, the contracted activity will provide a copy of applicable DOD, USN, USMC, and local instructions required under this contract. All other references, i.e., federal and state code, professional, association, and industry standards and guidelines, many of which are available from various web sites, shall be provided by the Contractor. The following items that appear as <u>blue and underlined</u> are linked to a web site.

Document	Title
29 CFR (1)	Labor
29 CFR Part 1910	Occupational Safety and Health Standards
40 CFR 112	Oil Pollution Prevention
49 CFR 171	Hazardous Materials Regulations; General information, regulations, and definitions
49 CFR 172	Hazardous materials table, special provisions, hazardous materials communications, emergency response information, and training requirements
49 CRF 173	Shippersgeneral requirements for shipments and packaging
49 CFR 178.345	General design and construction requirements applicable to Specification DOT 406
49 CFR 178.346	Specification DOT 406; cargo tank motor vehicles
49 CFR 180	Continuing Qualification and Maintenance of Packaging
49 CFR 382	Controlled Substance and Alcohol Use and Testing
49 CFR 383	Commercial Driver's License Standards; Requirements/Penalties
49 DFR 387	Minimum Levels of Financial Responsibility for Motor Carriers
49 CFR 390	Federal Motor Carrier Safety Regulations; General
49 CFR 391	Qualification of Drivers
49 CFR 392	Driving of Commercial Motor Vehicles
49 CFR 393	Parts and Accessories Necessary for Safe Operation
49 CFR 395	Hours of Service for Drivers
49 CFR 396	Inspection, Repair and Maintenance
NFPA 385	Tanks Vehicles for Flammable and Combustible Liquids
NFPA 407	Aircraft Fuel Servicing
API Bulletin 1529	Aviation Fuel Hose
API Publications 1581	Specifications and Qualifications Procedures for Aviation Jet Fuel Filter Separators
DOD 4140.25-M	DOD Management of Bulk Petroleum Products, Natural Gas, and Coal
MIL-STD-3004 (2)(4)	Quality Surveillance Handbook for Fuel, Lubricants and Related Products
NAVAIR 00-80T-109 (2)	Aircraft Refueling NATOPS Manual
NAVFAC P-300	Management of Transportation Equipment
<u>OPNAVINST 4790.2*</u>	The Navy Aviation Maintenance Program (NAMP)
OPNAVINST 5090.1* (3)	Environmental and Natural Resources Program Manual
NAVSUP P-558 (3)	Petroleum Management Ashore
NAVSUP Vol. II	Supply Ashore

⁽¹⁾ All Code of Federal Regulation (CFR) referenced are at the same web site. To access the basic web page, point to 29 CFR, click, and follow the web page instructions. In this and other links, the user is taken to the basic web page. The computer knowledge of and navigation of the web sites is a user responsibility.

⁽²⁾ User may require mil (Military) domain assistance or may have to register with this site in order to gain access and download documents.

⁽³⁾ An asterisk * at the end of a reference, i.e., OPNAVINST 4790.2*, indicates there is an Patuxent River designator to indicate the most recent version of the publication.

⁽⁴⁾ Go to SPECS & STDS, scroll to STINET and enter DODISS ID Number MIL-STD-3004 (see Note 2 above).

Appendix E Maps

The NAS Patuxent River Fuel Division will provide the following maps during the contract pre-bid on-site visit. The 8½ X 11 inch map or map set provided will become a part of the contract.

- 1. A local area map clearly showing the nearest major city/town, roads, the base, and outlying fields
- 2. A station/local area map showing the routes to any outlying fields requiring aviation or ground fuels support
- 3. Station and outlying field maps clearly showing all fuel and cryogenic facilities. Any connecting pipelines should be shown
- 4. Station and outlying field maps clearly showing the entire flightline areas, parking ramps by type of aircraft, hot pit facilities, restricted areas, and other information as may be useful to the Contractor
- 5. Station and outlying field map or a map set clearly showing all ground product delivery points, used oil or recyclable product collection points, and used oil or recyclable product disposition/delivery locations (color coded by grade of product)

Appendix F Quality Surveillance Program

The primary purpose of the Quality Surveillance Plan (QSP) and these Performance Requirements Summaries (PRSs) is to identify those performance requirements considered most critical to acceptable contract performance and the corresponding standards of performance. A PRS also identifies the Acceptable Quality Level (AQL) for each required service. It specifies the lot size that will be used as the basis for payment calculation as well as for sampling purposes, and the quality assurance methods, which the Government will use to evaluate the Contractor's performance in meeting the contract requirements. Finally, the PRS shows the percentage of the contract price that each listed contract requirement represents.

<u>Government Quality Assurance</u>. At the end of each inspection period, the Government will compare contractor performance to the contract standards and AQL/Allowable Degree of Deviation (ADD) using the Quality Assurance Plan (QAP). The Government will evaluate each required service based on one of the following inspection methods:

- a. Random sampling using the concepts of ANCI/ASQC Z1.4-1993
- b. One hundred percent inspection
- c. Validated customer complaints

Criteria for Acceptable and Unacceptable Performance. The standards indicate the levels of performance deemed acceptable to the Government. Performance of a required service is considered satisfactory when the percentage of defective units (unsatisfactory outputs) found by the Government during contract surveillance does not exceed that allowed by the AQL. When the percentage of defective units discovered by the COTR exceeds that allowed by the AQL/ADD, the contractor's performance is considered unsatisfactory. When the performance is unsatisfactory, the Contractor shall respond in writing to a Contract Discrepancy Report (CDR). The CDR will require the Contractor to explain, in writing, why performance was unacceptable, how performance will be returned to satisfactory levels, and how recurrence of the problem will be prevented in the future. The COTR will evaluate the Contractor's explanation and recommend to the Contracting Officer if full payment, partial payment, or the contract termination process is applicable. The Contractor's payment for services rendered will be calculated as stated in paragraph 4.

<u>Determination of the Number of Defective Units that Renders a Service Unsatisfactory.</u> For services inspected by random sampling, the number is determined from the ANCI/ASQC Z1.4-1993 charts. For services inspected by other than random sampling, the reject (unacceptable) level equals the next whole number greater than the number of defectives allowed by AQL. (NOTE: If the AQL is expressed as a percentage, it must first be multiplied by the lot size to determine the number of defective units allowed by unsatisfactory performance.)

<u>Re-performance of Unsatisfactory Work.</u> At the Government's discretion, the Contractor shall re-perform, without additional cost to the Government, all work found by the COTR to be unsatisfactorily performed. The Contracting Officer will determine the amount of time the Contractor will be given to re-perform the work on a case-by-case basis. Re-performance will not improve the overall rating of the service in question.

For services sampled, the maximum contract payment per month is multiplied by the maximum payment percentage for the service to determine the maximum payment for acceptable service. This payment is multiplied by the percentage of the sample found acceptable to determine the percentage of the contract price that the Contractor will be paid for the listed service. The total number of defectives found, not just those in excess of the reject level, are used to determine the percentage of the sample found unacceptable. The percentage of the sample found unacceptable subtracted from 100 percent determines the percentage of the lot found acceptable.

For services checked by One hundred percent inspection or validated customer complaint, the maximum payment percentage of the service in column 5 of the PRS is multiplied by the payment percentage of the lot found acceptable. The resulting percentage is the percentage of the monthly contract price that the Contractor will be paid for the listed service. The total number of defectives found, not just the defectives in excess of the reject level, are used to determine the percentage of the lot found acceptable.

For those services that are performed less frequently than monthly, surveillance and computation of the Contractor's payment will be made during or immediately following the month when that service is performed. The payment computation will be determined for the entire period since the last surveillance. Should computation of the Contractor's payment result in an amount less than has already been paid for the preceding month(s) of the period since the last surveillance, the Government will deduct the overpayment from the current month's invoice.

Contractor Payment

<u>Satisfactory Service</u>. For satisfactory performance of a service, the Government will pay the Contractor the percentage of the monthly contract price indicated for that service.

<u>Unsatisfactory Service</u>. For unsatisfactory performance not caused by Government interference or Government failure to provide C3 requirements, the Government will pay the Contractor only for the percent of work found to be satisfactory.

<u>Random Sampling</u>. Payment based upon a finding of unsatisfactory service is calculated on the percentage of the sample found satisfactory. Payment will be calculated as follows: (maximum payment for satisfactory service x (% of sample found satisfactory) = payment for percentage of service found satisfactory.

EXAMPLE	EXAMPLE				
Maximum Contract Payment Per Month	\$10,000.00				
Maximum payment percentage for this service:	9% (\$900.00)				
Quantity of Units Completed:	450 (lot size)				
AQL	10%				
Sample size:	50				
Reject level:	11(MIL-STD-105D)				
Unsatisfactory units found:	20				
Satisfactory units found:	30				
Service is unsatisfactory					
Maximum payment for satisfactory service would be	900				
% of sample found satisfactory (60 divided by 100 = 60%)	60%				
Payment for percentage of service found satisfactory	\$540				

One hundred percent Inspection and Validated Customer Complaints. Payment for unsatisfactory service is based on the percentage of the **lot** found satisfactory. Payment will be calculated as follows: (maximum payment for satisfactory service) x (% of lot found satisfactory) = payment for percentage of service found satisfactory.

EXAMPLE				
Maximum Contract Payment Per Month	\$10,000.00			
Maximum payment percentage for this service:	9% (\$900.00)			
Quantity of Units Completed:	100 (lot size)			
AQL	10%			
Unsatisfactory units found:	40			
Satisfactory units found:	60			
Service is unsatisfactory	\$900			
Maximum payment for satisfactory service would be				
% of sample found satisfactory (60 divided by 100 = 60%)	60%			
Payment for percentage of service found satisfactory	\$540			

<u>Payment for Service with a Surveillance Period Longer than Monthly.</u> Some of the line items listed in the PRS have a surveillance period which is longer than monthly. Throughout the surveillance period, the Government will inspect each unit completed for these line items using the inspection method specified in the PRS. Each month the Government will pay the Contractor the maximum payment percentage allowed for that service, as if the service were found satisfactory. At the end of the surveillance period, the Government will compare the Contractor's performance for the entire surveillance period to the AQL for that line item to determine if overall performance for the line item was satisfactory.

<u>Satisfactory Service</u>. Payment for satisfactory performance will be calculated as follows: (maximum payment for satisfactory service) - (payments made during the surveillance period) = total amount of adjustment at the end of the surveillance period.

Unsatisfactory Service. Payment for unsatisfactory performance will be calculated as follows:

For services inspected by random sampling: (maximum payment for satisfactory service) x (% of sample found satisfactory) - (payments made during surveillance period) = amount of adjustment at end of surveillance period.

For services inspected by One hundred percent inspection and validated customer complaints: (maximum payment for satisfactory service) x (% of lot found satisfactory) - (payments made during surveillance period) = amount of adjustment at end of surveillance period.

Nothing in the foregoing provisions will diminish or preclude Government actions pursuant to the "Default" clause or other terms and conditions of this contract.

Aircraft Fuel Services to include the Dispatch Center

Requirement/Reference			Method of Surveillance	Max Percent Payment for Meeting AQL
Staffing, <u>Table 1</u> , <u>C-1.8</u> , , <u>C-1.9.1</u> and <u>C-1.9.2</u>	Sufficient qualified Driver/System Operators on duty to satisfy receipt, product handling, and movement demands.	0%	100% Inspection	20
Qualifications, <u>C-1.9.1</u> and <u>C-1.9.2</u>	Qualified personnel, Driver/System Operators and Dispatcher performing duties. Training records/documents validate qualifications.	0%	100% Inspection	10
Hours of Operation, <u>Table 1</u>	Personnel available and equipment/systems inspected and ready for service by the designated start of the duty day.	0%		5
Dispatch Control, C-2.2.1.2	Requests for full-service accurately posted/logged.	5%	Random	4
Documentation, C-2.9 and C-2.12	Scanners downloaded and ready for the days business. Accounting documents accurate legible and forwarded to accounting in a			2
Quality, <u>C-2.10</u>	Appropriate sample taken and visually examined. Results documented and logs maintained.	5%	Random	15
Quality Surveillance, C-1.9.2, C-2.10	nce, C-1.9.2, C-2.10 Individuals performing quality surveillance trained, qualified, and documented as such.		10	
Housekeeping, <u>C-2.1.2.2.1</u> Grounds Maintenance, <u>C-2.1.2.2.3</u>	2.2.1 Buildings maintained in a clean, sanitary, and organized condition. Grounds maintained in a neat, trim condition.		Random	2
Training, C-2.13	Applicable training conducted/documented. Records complete.	5%	Random	2
Safety, <u>C-2.14</u>	Fuel servicing operations conducted in accordance with applicable safety regulations. Safety briefings undertaken and documented. Safety posters apparent and materials available to operators.	0% Random		20
Environmental, <u>C-2.15</u>	Contractor in full compliance with environmental law and regulations. Personnel trained to the appropriate OSHA HAZWOPER level.	0% Random		4
Security, <u>C-2.16</u>	Security measures appropriate to the threat level taken to protect government and contractor equipment. Patrols made/logs kept.	0%	Random	2
Equipment Specifications, <u>C-3.1</u>	Contractor provided equipment configured in accordance with the specifications outline in the PWS.	5%	100% Inspection	1
Other Equipment/Supplies, <u>C-3.3</u>	Contractor provided equipment and supplies identified readily available to contract personnel.	5%	100% Inspection	1
Uniforms/Safety Equipment, C-3.4	Uniforms provided and worn by contract employees. Safety equipment available and used.	0%	100% Inspection	1
References, <u>Appendix D</u>	The most current reference documents readily available to contract personnel.	5%	100% Inspection	1
				100

Fuel Distribution and Storage (VQ-4 Area)

Requirement/Reference	Standard	Max Allowable Degree of Deviation (AQL)	Method of Surveillance	Max Percent Payment for Meeting AQL
Staffing, <u>Table 1</u> , <u>C-1.8</u> , , <u>C-1.9.1</u> and <u>C-1.9.2</u>	Sufficient qualified Fuel Distribution System Operators on duty to satisfy receipt, product handling, and movement demands.	0%	100% Inspection	20
Qualifications, <u>C-1.9.1</u> and <u>C-1.9.2</u>	Qualified personnel performing duties. Training records/documents validate qualifications.	0%	100% Inspection	10
ours of Operation, <u>Table 1</u>	Equipment/systems inspected and ready for service by the designated start of the duty day.	0%		5
ocumentation, C-2.9 and C-2.12	Accounting documents accurate, legible, and forwarded to accounting in a timely manner. System inspection documents readily available to the COR	5%	Random	1
uality, <u>C-2.10</u>	Appropriate sample taken and visually examined. Results documented and logs maintained. Random			
uality Surveillance, C-1.9.2, C-2.10	urveillance, C-1.9.2, C-2.10 Individuals performing quality surveillance trained, qualified, and documented as such.		10	
ampling and Testing, C-2.10.2	g and Testing, C-2.10.2 Sample/test logged and documentation maintained.		5	
ousekeeping, <u>C-2.1.2.2.1</u> rounds Maintenance, <u>C-2.1.2.2.3</u>	Buildings maintained in a clean, sanitary, and organized condition. Grounds maintained in a neat, trim condition.	5% Random		2
raining, C-2.13			Random	2
afety, <u>C-2.14</u>	Fuel servicing operations conducted in accordance with applicable safety regulations. Safety briefings undertaken and documented. Safety posters apparent and materials available to operators.	0%	Random	20
nvironmental, <u>C-2.15</u>	Contractor in full compliance with environmental law and regulations. Personnel trained to the appropriate OSHA HAZWOPER level.	0%	Random	4
ecurity, <u>C-2.16</u>	Security measures appropriate to the threat level taken to protect government and contractor equipment. Adherence to area security doctrine.	0% Random		2
quipment Specifications, <u>C-3.1</u>	Contractor provided equipment configured in accordance with the specifications outline in the PWS.	5%	100% Inspection	1
ther Equipment/Supplies, <u>C-3.3</u>	Contractor provided equipment and supplies identified readily available to contract personnel.	5%	100% Inspection	1
niforms/Safety Equipment, <u>C-3.4</u>	Uniforms provided and worn by contract employees. Safety equipment available and used.	0%	100% Inspection	1
eferences, Appendix D	The most current reference documents readily available to contract personnel.	5%	100% Inspection	1
				100

Service Station Operations

Requirement/Reference	Standard	Max Allowable Degree of Deviation (AQL)	Method of Surveillance	Max Percent Payment for Meeting AQL
Staffing, <u>Table 1</u> , <u>C-1.8</u> , , <u>C-1.9.1</u> and <u>C-1.9.2</u>	Sufficient qualified Fuel Distribution System Operators on duty to satisfy receipt, product handling, and movement demands.	0%	100% Inspection	25
Qualifications, <u>C-1.9.1</u> and <u>C-1.9.2</u>	Qualified personnel performing duties. Training records/documents validate qualifications.	0%	100% Inspection	10
Hours of Operation, <u>Table 1</u>	Equipment inspected and ready to customers at the designated start of the duty day.	0%		10
Documentation, <u>C-2.2.1.4</u>	Documents accurate, legible, and forwarded to accounting in a timely manner.	5%	Random	5
Quality, C-2.10	Appropriate sample taken and tested. Results documented and logs maintained.	5%	Random	10
Housekeeping, <u>C-2.1.2.2.1</u>	Buildings maintained in a clean, sanitary, and organized condition.	5%	Random	2
Training, <u>C-2.13</u>	Applicable system training conducted/documented. Records complete.	5%	Random	5
Fuel servicing operations conducted in accordance with applicable safety regulations. Safety briefings undertaken and documented. Safety posters apparent and materials available to operators.		0%	Random	20
Environmental, <u>C-2.15</u>	Contractor in full compliance with environmental law and regulations. Personnel trained to the appropriate OSHA HAZWOPER level.		Random	4
Security, <u>C-2.16</u>	Security measures appropriate to the threat level taken to protect government and contractor equipment.	0%	Random	5
Equipment Specifications, <u>C-3.1</u>	Equipment configured and maintained in accordance with the specifications outline in the PWS.	5%	100% Inspection	1
Other Equipment/Supplies, <u>C-3.3</u>	Contractor furnished equipment and supplies identified readily available to contract personnel.	5%	100% Inspection	1
Uniforms/Safety Equipment, <u>C-3.4</u>	Uniforms provided and worn by contract employees. Safety equipment available and used.	0%	100% Inspection	1
References, <u>Appendix D</u>	The most current reference documents readily available to contract personnel.	5%	100% Inspection	1
	1	<u> </u>		100

Ground Fuel Delivery

Requirement/Reference	Standard	Max Allowable Degree of Deviation (AQL)	Method of Surveillance	Max Percent Payment for Meeting AQL
Staffing, , <u>Table 1</u> , <u>C-1.8</u> , <u>C-1.9.1</u> and <u>C-1.9.2</u>	Sufficient qualified driver/operators on duty to satisfy servicing demands.	0%	100% Inspection	20
Qualifications, <u>C-1.9.1</u> and <u>C-1.9.2</u>	Personnel on duty qualified to performing assigned tasks. Training records/documents validate qualifications.	0%	100% Inspection	10
Hours of Operation, <u>Table 1</u>	Equipment readily available (inspected, sampled, and visually examined) at the designated start of the duty day.	0%	100% Inspection	4
Dispatch Control, C-2.2.1.2	Requests for full-service accurately posted/logged.	5%	Random	4
Documentation, <u>C-2.2.1.2</u>	Documents accurate, legible, and forwarded to accounting in a timely manner.	5%	Random	1
Response Time, <u>C-2.2.2.2</u>	Established servicing response times meet. Responses in excess of established limits fully explained in pass down logs/management reports.	5%	Customer Complaint	15
After Hour Response, C-2.2.2.1	Government approved after hour response mechanism established.	0%	Customer Complaint	5
Mobile Fuel Servicing Equipment, C-2.2.3.1	Government provided equipment properly maintained and readily available for dispatch.	5%		4
Quality, C-2.10	Appropriate sample taken and tested. Results documented and logs maintained.	5%	Random	10
Housekeeping, <u>C-2.12.2.1</u> Grounds Maintenance, <u>C-2.12.2.3</u>	Buildings maintained in a clean, sanitary, and organized condition. Grounds maintained in a neat, trim condition. Glass and vegetation cut to specified standards.		Random	2
Training, C-2.13	Applicable training conducted/documented. Records complete. Monitor appointed.	5%	Random	2
Safety, <u>C-2.14</u>	Fuel servicing operations conducted applicable safety regulations. Safety briefings undertaken and documented. Safety posters apparent and materials available to operators.	0%	Random	15
Environmental, <u>C-2.15</u>	Contractor in full compliance with environmental law and regulations. Personnel trained to the appropriate 8-hour first responder HAZWOPER level.	0%	Random	3
Security, <u>C-2.16</u>	Security measures appropriate to the threat level taken to protect government and contractor equipment. Security s made/logs kept.	0%	Random	2
Equipment Specifications, C-3.1	Reserved.		_	
Other Equipment/Supplies, C-3.4	Equipment and supplies identified readily available to contract personnel.	5%	100% Inspection	1
Uniforms/Safety Equipment, C-3.5	Uniforms provided and worn by contract employees. Safety equipment available and used.	0%	100% Inspection	1
References, Appendix D	The most current reference documents readily available to contract personnel.	5%	100% Inspection	1
				100

Used Oil Collection and Disposition

Requirement/Reference	Standard	Max Allowable Degree of Deviation (AQL)	Method of Surveillance	Max Percent Payment for Meeting AQL
Staffing, , <u>Table 1</u> , <u>C-1.8</u> , <u>C-1.9.1</u> and <u>C-1.9.2</u>	Sufficient qualified driver/operators on duty to satisfy servicing demands.	0%	100% Inspection	20
Qualifications, <u>C-1.9.1</u> and <u>C-1.9.2</u>	Personnel on duty qualified to performing assigned tasks. Training records/documents validate qualifications.	0%	100% Inspection	10
Hours of Operation, <u>Table 1</u>	Equipment readily available (inspected, sampled, and visually examined) at the designated start of the duty day.	0%	100% Inspection	4
Dispatch Control, C-2.2.1.2	Requests for full-service accurately posted.	5%	Random	4
Documentation, <u>C-2.2.1.2</u>	Documents accurate, legible, and forwarded to accounting in a timely manner.	5%	Random	1
Response Time, <u>C-2.2.2.2</u>	Established servicing response times meet. Responses in excess of established limits fully explained in pass down logs/management reports.	5%	Customer Complaint	15
After Hour Response, C-2.2.2.2.1	Government approved after hour response mechanism established.	0%	Customer Complaint	5
Mobile Fuel Servicing Equipment, C-2.2.2.3.1	Government provided equipment properly maintained and readily available for dispatch.	5%	•	4
Quality, C-2.10	Appropriate sample taken and tested. Results documented and logs maintained.	5%	Random	10
Housekeeping, <u>C-2.12.2.1</u> Grounds Maintenance, <u>C-2.12.2.3</u>	Buildings maintained in a clean, sanitary, and organized condition. Grounds maintained in a neat, trim condition. Glass and vegetation cut to specified standards.		Random	2
Training, C-2.13	Applicable training conducted/documented. Records complete. Monitor appointed.	5%	Random	2
Safety, <u>C-2.14</u>	Fuel servicing operations conducted applicable safety regulations. Safety briefings undertaken and documented. Safety posters apparent and materials available to operators.	0%	Random	15
Environmental, <u>C-2.15</u>	Contractor in full compliance with environmental law and regulations. Personnel trained to the appropriate 8-hour first responder HAZWOPER level.	0%	Random	3
Security, <u>C-2.16</u>	Security measures appropriate to the threat level taken to protect government and contractor equipment. Security s made/logs kept.	0%	Random	2
Equipment Specifications, <u>C-3.1</u>	Reserved.		_	_
Other Equipment/Supplies, C-3.4	Equipment and supplies identified readily available to contract personnel.	5%	100% Inspection	1
Uniforms/Safety Equipment, C-3.5	Uniforms provided and worn by contract employees. Safety equipment available and used.	0%	100% Inspection	1
References, Appendix D	The most current reference documents readily available to contract personnel.	5%	100% Inspection	1
				100

Cryogenic Storage and Distribution

Requirement/Reference	Standard	Max Allowable Degree of Deviation (AQL)	Method of Surveillance	Max Percent Payment for Meeting AQL
Staffing, , <u>Table 1</u> , <u>C-1.8</u> , <u>C-1.9.1</u> and <u>C-1.9.2</u>	Sufficient qualified supervisor/operators on duty to satisfy servicing demands. Two (2) man policies enforced.	0%	100% Inspection	30
Qualifications, <u>C-1.9.1</u> and <u>C-1.9.2</u>	Personnel on duty qualified to performing assigned tasks. Training records/documents validate qualifications.	0%	100% Inspection	20
Hours of Operation, <u>Table 1</u>	Equipment readily available (inspected, sampled, and visually examined) at the designated start of the duty day.	0%	100% Inspection	4
Documentation, <u>C-2.2.1.2</u>	Documents accurate, legible, and forwarded to accounting in a timely manner.	5%	Random	5
Cryogenic Tank and Equipment, C-2.8.1.5	Government provided equipment properly maintained and readily available for dispatch.	5%		4
Quality, <u>C-2.10</u>	Appropriate sample taken and forwarded to XXXX. Results documented, logs and records maintained.	5%	Random	10
Housekeeping, <u>C-2.12.2.1</u> Grounds Maintenance, <u>C-2.12.2.3</u>	Buildings maintained in a clean, sanitary, and organized condition. Grounds maintained in a neat, trim condition. Glass and vegetation cut to specified standards.	10%	Random	2
Training, <u>C-2.13</u>	Applicable training conducted/documented. Records complete. Monitor appointed. 5% Rand		Random	2
Safety, <u>C-2.14</u>	Fuel servicing operations conducted applicable safety regulations.		Random	15
Environmental, <u>C-2.15</u>	Contractor in full compliance with environmental law and regulations. Personnel trained to the appropriate 8-hour first responder HAZWOPER level.	0%	Random	3
Security, <u>C-2.16</u>	Security measures appropriate to the threat level taken to protect government and contractor equipment. Security s made/logs kept.	0%	Random	2
Equipment Specifications, <u>C-3.1</u>	Reserved.			
Other Equipment/Supplies, <u>C-3.4</u>	Equipment and supplies identified readily available to contract personnel.	5%	100% Inspection	1
Uniforms/Safety Equipment, C-3.5	Uniforms provided and worn by contract employees. Safety equipment available and used.	0%	100% Inspection	1
References, Appendix D	The most current reference documents readily available to contract personnel.	5%	100% Inspection	1
				100

VEH	ICLE ID	ENT	IF	ICATI	ON V	VO	R	KSHE	ET	
		A. C	ON	TRACT D	ATA					
Contract L	ocation		(Contract Nu	mber			Contr	act 1	Period
	B. TI	HE TRA	AC I	ΓOR (PRIN	ЛЕ МО	VE	R)			
Man	ufacture			Mode	el		Mo	del Year		Gas/Diesel
Number of Axles	Gross G	VWR		GVWR I	Front	GV	VW.	R 1st Rear	G	VWR 2nd Rear
V	IN		C	Contractor Co	ontrol Nu	ımbe	r	License I	No. (if applicable)
	C. T	HE CA	RG	O TANK/	REFUE	LE	R			
Manufactu	re	Year	Mar	nufactured	Capa	acity		No. of Axl	es	GVWR
MC/DOT Speci	fication	Da	Date Certified			Certification No.				
VIN or Tank Se	rial No.	Contr	tractor Number Lice			Lice	nse No. (if ap	plic	able)	
	D.	NOTE	ES &	& ATTACI	HMEN	TS				
Attach a copy of the carg be pertinent and applicab	le to the identifica							aivers and oth	er d	ocuments as may
Contract Representat	ive							Date		

NOLSC Petroleum Equipment Control Form

Exhibits of Product Handling

NOTE

The Exhibit of Pit (Cold Refueling) Services for FY04, Page FY04-3 does not reflect issues or the date/time data relevant to VQ-4. Manual records do not permit an accurate summary of this data. However, for FY04 some 172 aircraft have been serviced via the direct servicing system for 1,638,618 in issues or an average of 9,500 gallon per issue. Also note, once more than a single airframe is on the ground at VQ-4, the additional aircraft are refueled by truck.

Efforts are underway to task the contractor to update the attached as the workload occurs.

Exhibit of JP5 Receipts by Pipeline at VQ4, FY04-07 Naval Air Station Patuxent River

Month	Gallons Received	FY Cumulative	No. of Receipts	FY Cumulative
Oct-03	183,585	183,585	13	13
Nov-03	152,207	335,792	8	21
Dec-03	188,786	524,578	14	35
Jan-04	124,762	649,340	13	48
Feb-04	126,946	776,286	9	57
Mar-04	148,866	925,152	11	68
Apr-04	150,354	1,075,506	12	80
May-04	112,597	1,188,103	10	90
Jun-04	180,509	1,368,612	13	103
Jul-04	139,162	1,507,774	14	117
Aug-04		1,507,774		117
Sep-04		1,507,774		117
Oct-04		0		0
Nov-04		0		0
Dec-04		0		0
Jan-05		0		0
Feb-05		0		0
Mar-05		0		0
Apr-05		0		0
May-05		0		0
Jun-05		0		0
Jul-05		0		0
Aug-05		0		0
Sep-05		0		0
Oct-05		0		0
Nov-05		0		0
Dec-05		0		0
Jan-06		0		0
Feb-06		0		0
Mar-06		0		0
Apr-06		0		0
May-06		0		0
Jun-06		0		0
Jul-06		0		0
Aug-06		0		0
Sep-06		0		0
Oct-06		0		0
Nov-06		0		0
Dec-06		0		0
Jan-07		0		0
Feb-07		0		0
Mar-07		0		0
Apr-07		0		0
May-07		0		0
Jun-07		0		0
Jul-07		0		0
Aug-07		0		0
Sep-07		0		0
Averages	150,777	N/A	12	N/A

Exhibit of MUR Receipts at the Service Station, FY04-07 Naval Air Station Patuxent River

Month	Gallons Received	FY Cumulative	No. of Receipts	FY Cumulative
Oct-03	15,990	15,990	2	2
Nov-03	8,035	24,025	1	3
Dec-03	16,176	40,201	2	5
Jan-04	8,112	48,313	1	6
Feb-04	16,168	64,481	2	8
Mar-04	8,074	72,555	1	9
Apr-04	16,112	88,667	2	11
May-04	8,105	96,772	1	12
Jun-04	15,916	112,688	2	14
Jul-04	15,844	128,532	2	16
Aug-04		128,532		16
Sep-04		128,532		16
Oct-04		0		0
Nov-04		0		0
Dec-04		0		0
Jan-05		0		0
Feb-05		0		0
Mar-05		0		0
Apr-05		0		0
May-05		0		0
Jun-05		0		0
Jul-05		0		0
Aug-05		0		0
Sep-05		0		0
Oct-05		0		0
Nov-05		0		0
Dec-05		0		0
Jan-06		0		0
Feb-06		0		0
Mar-06		0		0
Apr-06		0		0
May-06		0		0
Jun-06		0		0
Jul-06		0		0
Aug-06		0	1	0
Sep-06		0		0
Oct-06		0		0
Nov-06		0	1	0
Dec-06		0	1	0
Jan-07		0		0
Feb-07		0		0
Mar-07		0	1	0
Apr-07		0	1	0
May-07		0	1	0
Jun-07		0		0
Jul-07		0		0
Aug-07		0		0
Sep-07		0		0
00p-07	12,853	N/A	2	N/A

Exhibit of LS2 Receipts at the Service Station, FY04-07 Naval Air Station Patuxent River

Month	Gallons Received	FY Cumulative	No. of Receipts	FY Cumulative
Oct-03	7,492	7,492	1	1
Nov-03	0	7,492	0	1
Dec-03	0	7,492	0	1
Jan-04	7,548	15,040	1	2
Feb-04	0	15,040	0	2
Mar-04	7,552	22,592	1	3
Apr-04	7,493	30,085	1	4
May-04	0	30,085	0	4
Jun-04	7,473	37,558	1	5
Jul-04	0	37,558	0	5
Aug-04		37,558		5
Sep-04		37,558		5
Oct-04		0		0
Nov-04		0		0
Dec-04		0		0
Jan-05		0		0
Feb-05		0		0
Mar-05		0		0
Apr-05		0		0
May-05		0		0
Jun-05		0		0
Jul-05		0		0
Aug-05		0		0
Sep-05		0		0
Oct-05		0		0
Nov-05		0		0
Dec-05		0		0
Jan-06		0		0
Feb-06		0		0
Mar-06		0		0
Apr-06		0		0
May-06		0		0
Jun-06		0		0
Jul-06		0		0
Aug-06		0		0
Sep-06		0		0
Oct-06		0		0
Nov-06		0		0
Dec-06		0		0
Jan-07		0		0
Feb-07		0		0
Mar-07		0		0
Apr-07		0		0
May-07		0		0
Jun-07		0		0
Jul-07		0		0
Aug-07		0		0
Sep-07		0		0
Averages	7,512	N/A	1	N/A

Only those months of activity are averaged.

Exhibit of JP5 Issues by Truck (Cold Refuelng), FY04 Naval Air Station Patuxent River

Month	Gallons Issued	Cumulative	No. of Issues	Cumulative
Oct-03	1,433,606	1,433,606	1,670	1,670
Nov-03	1,057,632	2,491,238	1,133	2,803
Dec-03	1,110,646	3,601,884	1,132	3,935
Jan-04	931,790	4,533,674	1,044	4,979
Feb-04	1,214,286	5,747,960	1,248	6,227
Mar-04	1,392,223	7,140,183	1,462	7,689
Apr-04	1,322,896	8,463,079	1,448	9,137
May-04	1,112,565	9,575,644	1,330	10,467
Jun-04	999,918	10,575,562	1,257	11,724
Jul-04	997,866	11,573,428	1,126	12,850
Aug-04		11,573,428		12,850
Sep-04		11,573,428		12,850
Oct-04		0		0
Nov-04		0		0
Dec-04		0		0
Jan-05		0		0
Feb-05		0		0
Mar-05		0		0
Apr-05		0		0
May-05		0		0
Jun-05		0		0
Jul-05		0		0
Aug-05		0		0
Sep-05		0		0
Oct-05		0		0
Nov-05		0		0
Dec-05		0		0
Jan-06		0		0
Feb-06		0		0
Mar-06		0		0
Apr-06		0		0
May-06		0		0
Jun-06		0		0
Jul-06		0		0
Aug-06		0		0
Sep-06		0		0
Oct-06		0		0
Nov-06		0		0
Dec-06		0		0
Jan-07		0		0
Feb-07		0		0
Mar-07		0		0
Apr-07		0		0
Мау-07		0		0
Jun-07		0		0
Jul-07		0		0
Aug-07		0		0
Sep-07		0		0
Average	1,157,343	N/A	1,285	N/A

Exhibit of JP5 Issues by Pit (Cold Refuelng), FY04 Naval Air Station Patuxent River

Month	Gallons Issued	Cumulative	No. of Issues	Cumulative
Oct-03	0	0	0	0
Nov-03	0	0	0	0
Dec-03	0	0	0	0
Jan-04	0	0	0	0
Feb-04	0	0	0	0
Mar-04	0	0	0	0
Apr-04	0	0	0	0
May-04	0	0	0	0
Jun-04	0	0	0	0
Jul-04		0		0
Aug-04		0		0
Sep-04		0		0
Oct-04		0		0
Nov-04		0		0
Dec-04		0		0
Jan-05		0		0
Feb-05		0		0
Mar-05		0		0
Apr-05		0		0
May-05		0		0
Jun-05		0		0
Jul-05		0		0
Aug-05		0		0
Sep-05		0		0
Oct-05		0		0
Nov-05		0		0
Dec-05		0		0
Jan-06		0		0
Feb-06		0		0
Mar-06		0		0
Apr-06		0		0
May-06		0		0
Jun-06		0		0
Jul-06		0		0
Aug-06		0		0
Sep-06		0		0
Oct-06		0		0
Nov-06		0		0
Dec-06		0		0
Jan-07		0		0
Feb-07		0		0
Mar-07		0		0
Apr-07		0		0
May-07		0		0
Jun-07		0		0
Jul-07		0		0
Aug-07		0		0
Sep-07		0		0
Average	0	N/A	0	N/A

Exhibit of JP5 Defuels by Truck, FY04 Naval Air Station Patuxent River

Month	Gallons Defueled	Cumulative	No. of Defuels	Cumulative
Oct-03	0	0	48	48
Nov-03	0	0	43	91
Dec-03	0	0	46	137
Jan-04	0	0	39	176
Feb-04	0	0	46	222
Mar-04	0	0	51	273
Apr-04	0	0	58	331
May-04	0	0	67	398
Jun-04	0	0	58	456
Jul-04	0	0	50	506
Aug-04		0		506
Sep-04		0		506
Oct-04		0		0
Nov-04		0		0
Dec-04		0		0
Jan-05		0		0
Feb-05		0		0
Mar-05		0		0
Apr-05		0		0
May-05		0		0
Jun-05		0		0
Jul-05		0		0
Aug-05		0		0
Sep-05		0		0
Oct-05		0		0
Nov-05		0		0
Dec-05		0		0
Jan-06		0		0
Feb-06		0		0
Mar-06		0		0
Apr-06		0		0
May-06		0		0
Jun-06		0		0
Jul-06		0		0
Aug-06		0		0
Sep-06		0		0
Oct-06		0		0
Nov-06		0		0
Dec-06		0		0
Jan-07		0		0
Feb-07		0		0
Mar-07		0		0
Apr-07		0		0
May-07		0		0
Jun-07		0		0
Jul-07		0		0
Aug-07		0		0
Sep-07		0		0
Average	0	N/A	51	N/A

Exhibit of Net JP5 Issues (Sales) and Evolutions (Workload) Naval Air Station Patuxent River

			Issues and Evolutions		
Month	Net Issues	Truck	Pit	Defuels	Total
Oct-03	1,433,606	1,670	0	48	1,718
Nov-03	1,057,632	1,133	0	43	1,176
Dec-03	1,110,646	1,132	0	46	1,178
Jan-04	931,790	1,044	0	39	1,083
Feb-04	1,214,286	1,248	0	46	1,294
Mar-04	1,392,223	1,462	0	51	1,513
Apr-04	1,322,896	1,448	0	58	1,506
May-04	1,112,565	1,330	0	67	1,397
Jun-04	999,918	1,257	0	58	1,315
Jul-04	997,866	1,126	0	50	1,176
Aug-04	0	0	0	0	0
Sep-04	0	0	0	0	0
Oct-04	0	0	0	0	0
Nov-04	0	0	0	0	0
Dec-04	0	0	0	0	0
Jan-05	0	0	0	0	0
Feb-05	0	0	0	0	0
Mar-05	0	0	0	0	0
Apr-05	0	0	0	0	0
May-05	0	0	0	0	0
Jun-05	0	0	0	0	0
Jul-05	0	0	0	0	0
Aug-05	0	0	0	0	0
Sep-05	0	0	0	0	0
Oct-05	0	0	0	0	0
Nov-05	0	0	0	0	0
Dec-05	0	0	0	0	0
Jan-06	0	0	0	0	0
Feb-06	0	0	0	0	0
Mar-06	0	0	0	0	0
Apr-06	0	0	0	0	0
May-06	0	0	0	0	0
Jun-06	0	0	0	0	0
Jul-06	0	0	0	0	0
Aug-06	0	0	0	0	0
Sep-06	0	0	0	0	0
Oct-06	0	0	0	0	0
Nov-06	0	0	0	0	0
Dec-06	0	0	0	0	0
Jan-07	0	0	0	0	0
Feb-07	0	+	0		
Mar-07 Apr-07	0	0	0	0	0
May-07	0	0	0	0	0
Jun-07	0	0	0	0	0
Jul-07 Jul-07	0	0	0	0	0
Jui-07 Aug-07	0	0	0	0	0
Sep-07	0	0	0	0	0
Average	N/A	N/A	N/A	N/A	N/A
Total for num	N/A		l of aguinment issue	o to circroft	IV/A

Total for number of issues is a more accurate portial of equipment issues to aircraft.

Exhibit of JP5 Net Issues (Sales) and Evolutions (Workload) Naval Air Station Patuxent River

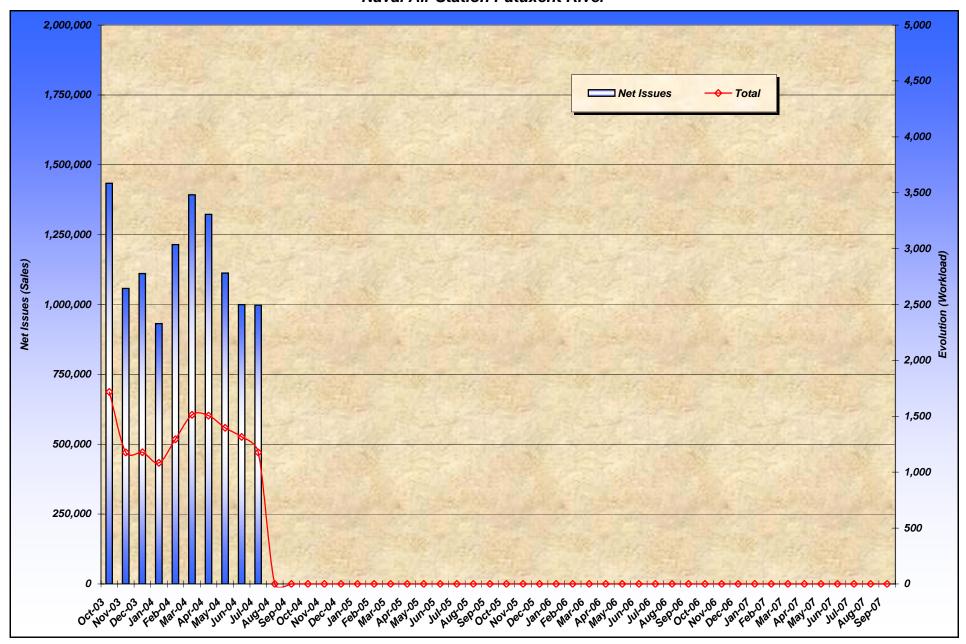


Exhibit of MUR Issues by all Modes, FY04 Naval Air Station Patuxent River

Month	Truck Issues	Cumulative	No.	SS Issues	Cumulative	Total All	Cumulative
Oct-03	3,309	3,309	100	11,858	11,858	15,167	15,167
Nov-03	3,157	6,466	87	8,856	20,714	12,013	27,180
Dec-03	5,773	12,239	92	9,659	30,373	15,432	42,612
Jan-04	9,836	22,075	73	2,542	32,915	12,378	54,990
Feb-04	2,647	24,722	108	8,799	41,714	11,446	66,436
Mar-04	3,007	27,729	93	10,599	52,313	13,606	80,042
Apr-04	3,861	31,590	73	9,214	61,527	13,075	93,117
May-04	3,592	35,182	91	9,208	70,735	12,800	105,917
Jun-04	5,249	40,431	103	8,933	79,668	14,182	120,099
Jul-04	5,600	46,031	96	8,593	88,261	14,193	134,292
Aug-04		46,031			88,261		134,292
Sep-04		46,031	916		88,261		134,292
Oct-04		0			0		0
Nov-04		0			0		0
Dec-04		0			0		0
Jan-05		0			0		0
Feb-05		0			0		0
Mar-05		0			0		0
Apr-05		0			0		0
May-05		0			0		0
Jun-05		0			0		0
Jul-05		0			0		0
Aug-05		0			0		0
Sep-05		0	0		0		0
Oct-05		0			0		0
Nov-05		0			0		0
Dec-05		0			0		0
Jan-06		0			0		0
Feb-06		0			0		0
Mar-06		0			0		0
Apr-06		0			0		0
May-06		0			0		0
Jun-06		0			0		0
Jul-06		0			0		0
Aug-06		0			0		0
Sep-06		0	0		0		0
Oct-06		0			0		0
Nov-06		0			0		0
Dec-06		0			0		0
Jan-07		0			0		0
Feb-07		0			0		0
Mar-07		0			0		0
Apr-07		0			0		0
May-07		0			0		0
Jun-07		0			0		0
Jul-07		0			0		0
Aug-07		0			0		0
Sep-07		0	0		0		0
Average	4603	N/A	131	8826	N/A	13429	N/A

Exhibit of FS2 Issues by Truck, FY04 Naval Air Station Patuxent River

Month	Truck Issues	Cumulative	No.	SS Issues	Cumulative	Total All	Cumulative
Oct-03	28,282	28,282	118			28,282	28,282
Nov-03	42,669	70,951	173			42,669	70,951
Dec-03	80,537	151,488	308			80,537	151,488
Jan-04	88,520	240,008	295			88,520	240,008
Feb-04	85,635	325,643	221			85,635	325,643
Mar-04	66,297	391,940	233			66,297	391,940
Apr-04	47,270	439,210	144			47,270	439,210
May-04	25,792	465,002	110			25,792	465,002
Jun-04	24,143	489,145	102			24,143	489,145
Jul-04	12,453	501,598	96			12,453	501,598
Aug-04		501,598					501,598
Sep-04		501,598	1,800				501,598
Oct-04		0					0
Nov-04		0					0
Dec-04		0					0
Jan-05		0					0
Feb-05		0					0
Mar-05		0					0
Apr-05		0					0
May-05		0					0
Jun-05		0					0
Jul-05		0					0
Aug-05		0					0
Sep-05		0	0				0
Oct-05		0					0
Nov-05		0					0
Dec-05		0					0
Jan-06		0					0
Feb-06		0					0
Mar-06		0					0
Apr-06		0					0
May-06		0					0
Jun-06		0					0
Jul-06		0					0
Aug-06		0					0
Sep-06		0	0				0
Oct-06		0					0
Nov-06		0					0
Dec-06		0					0
Jan-07		0					0
Feb-07		0					0
Mar-07		0					0
Apr-07		0					0
May-07		0					0
Jun-07		0					0
Jul-07		0					0
Aug-07		0					0
Sep-07		0	0				0
Average	50,160	N/A	257	N/A	N/A	50,160	N/A

Exhibit of JP5 Issues by Truck as a Ground Fuel, FY04 Naval Air Station Patuxent River

Month	Truck Issues	Cumulative	No.	SS Issues	Cumulative	Total All	Cumulative
Oct-03	8,611	8,611	220			8,611	8,611
Nov-03	5,911	14,522	168			5,911	14,522
Dec-03	7,790	22,312	206			7,790	22,312
Jan-04	6,314	28,626	177			6,314	28,626
Feb-04	8,118	36,744	222			8,118	36,744
Mar-04	8,528	45,272	208			8,528	45,272
Apr-04	6,244	51,516	151			6,244	51,516
May-04	7,273	58,789	165			7,273	58,789
Jun-04	8,844	67,633	212			8,844	67,633
Jul-04	10,605	78,238	210			10,605	78,238
Aug-04		78,238					78,238
Sep-04		78,238	1,939				78,238
Oct-04		0					0
Nov-04		0					0
Dec-04		0					0
Jan-05		0					0
Feb-05		0					0
Mar-05		0					0
Apr-05		0					0
May-05		0					0
Jun-05		0					0
Jul-05		0					0
Aug-05		0					0
Sep-05		0	0				0
Oct-05		0					0
Nov-05		0					0
Dec-05		0					0
Jan-06		0					0
Feb-06		0					0
Mar-06		0					0
Apr-06		0					0
May-06		0					0
Jun-06		0					0
Jul-06		0					0
Aug-06		0					0
Sep-06		0	0				0
Oct-06		0					0
Nov-06		0					0
Dec-06		0					0
Jan-07		0					0
Feb-07		0					0
Mar-07		0					0
Apr-07		0					0
May-07		0					0
Jun-07		0					0
Jul-07		0					0
Aug-07		0					0
Sep-07		0	0				0
Average	7,824	N/A	277	N/A	N/A	7,824	N/A

	MONDAY									
BLDG	STATUS	JON	LOCATION	TYPE	CAPACITY					
20	W	G000000008	Front side of HGR 111	AG	150					
103	W	G000000007	Air Ops heating.	AG	1000					
105	S/W	G000000008	East Patrol Road Electronics BLDG	AG	300					
117	W	G000000007	UFI Shop	AG	1000					
177	W	G000000007	AIMD Jet Shop Across from HGR 109	AG	1000					
214	W	G000000008	Boathouse 2, East Basin	AG	550					
312	W	G000000007	Boathouse 3, West Basin	AG	1000					
331	W	G000000008	Small BLDG Beside VX-1 Ramp Side	AG	275					
332	W	G00000008	GSE BLDG Next to HGR 301	AG	275					
438	W	G000000008	Behind Day Care Center	AG	550					
461	S/W	G000000006	Officers Club (Twice a week tank)	UG	5000					
525	W	G000000008	Water pump station by main gate	AG	500					
606	W	G000000007	ROICC office behind BLDG 304.	AG	300					
654	W	G000000008	STU, long blue building on water (2 275 gallon tanks).	AG	550					
1216	W	G000000008	MARS building behind the Post Office.	AG	275					
1405	W	G000000008	Down TPS hill, blue building.	AG	275					
1490	W	G000000008	CSD brown building beside tower in fence.	AG	275					
1492	W	G000000008	Tele Data building, North-East side of HGR 101	AG	275					
1581	W	G000000008	VX-1 Project Support Across From HGR 305	UG	1000					
1586	W	G000000008	Hobby Shop behind Drill Hall	AG	4000					
1598	W		Swimming Pools	AG	550					
1652	W		Cedar Point Road across from HGR 109	AG	275					
1684	S/W	G000000008	Steam Jenny next to HGR 301	AG	275					
1711	W	G000000008	Small BLDG beside FW in compound.	AG	550					
1712	W	G000000008	Don Russel BLDG, Perry Road	AG	275					
1820	W	G000000008	Beside VX-1 project building	AG	275					
2044	W	G000000008	Metal building across from FW in compound.	AG	275					
2052	W	G000000008	Old VQ-4 building on Cedar Point Road	AG	275					
2071	W	G000000008	Across from FW in back of parking lot.	AG	275					
2072	W	G000000008	Across from FW in back of parking lot.	AG	275					
2074	W	G000000008	TPS parking lot on hill.	AG	275					
2075	W	G000000008	TPS parking lot on hill.	AG	275					
2093	W	G000000008	On right going down hill to TPS.	AG	275					
2102	W	G000000008	TPS parking lot on hill.	AG	275					
2104	W	G000000008	Beside 606 and next to CPD building.	AG	6000					
2109	S/W	G000000007	Beside hangar 144 inside chain link fence.	AG	550					
Z118	S/W		Emergency generator at tower steps.	AG	20					
Z147	S/W	1	Emergency genterator in front of tower.	AG	500					
Z517	S/W		Emergency generator, road side of hangar 111.	AG	500					
Z1370	S/W		Emergency genterator, Hospital.	AG	550					
Z1390	S/W		Emergency genterator in air field across from 173.	AG	50					
Z1710	S/W		Emergency genterator, Tower.	AG	500					
Z2173	S/W	G000000010	Emergency generator, Commissary Store.	AG						
			,							

	TUESDAY							
BLDG	STATUS	JON	LOCATION	TYPE	CAPACITY			
197	W	G000000008	Tower, south side of Hangar 201.	AG	275			
243	W	G000000008	GSE Shop, lower south side of Hangar 201.	AG	275			
244	W	G000000008	Supply, Hangar 201.	AG	275			
502	W	G000000008	LOX Plant.	AG	275			
528	S/W	A000098634	Tate Road pump station.	AG	825			
946	S/W	A000098634	Quarters C near boathouse.	AG	275			
947	S/W	A000098634	East Patrol Road past land fill.	AG	275			
948	S/W	A000098634	Quarters.					
951	W	A000098634	Quarters H.	AG	275			
952	W	A000098634	Quarters J.	AG	550			
954	W	A000098634	Quarters L.	AG	275			
955	W	A000098634	Quarters M	AG	275			
957	W	A000098634	Quarters O.	AG	275			
958	W	A000098634	Quarters P.	AG	275			
960	W	A000098634	Quarters R.	AG	275			
961	W	A000098634	Quarters S.	AG	550			
962	W	A000098634	Quarters T.	AG	275			
963	W	A000098634	Quarters U.	AG	200			
964	W	A000098634	Quarters V.	AG	275			
968	W	A000098634	Quarters Z.	AG	275			
1410	W	.	Environmental building.	AG	1000			
1416	W		TSD building next to Hangar 101.	AG	275			
1461	W		Electronics Evaluation building on left before	AG	2000			
1669	W		Hush House behind Hangar 144.	UG	2000			
1680	W		Ambulance Shop.	AG	300			
2133A	S/W		Boeing Hangar 2133.	AG	6000			
2133A 2133B	S/W		Boeing Hangar 2133.	AG	6000			
Z2028	W		Behind Hangar 144.	UG	2000			
22020	VV	G000000010	Defilità Harigai 144.	00	2000			
					+			
					+			
					1			

WEDNESDAY							
BLDG	STATUS	JON	LOCATION	TYPE	CAPACITY		
8008	W	G000000008	Machanical Facility.	UG	1000		
8009	W	G000000008	Engineering Administration.	UG	2000		
8010	W	G000000008	CATS Division behind the Fire House.	AG	500		
8016	W	G000000008	Tempest Facility.	AG	500		
8076	S/W	G000000008	Generator, Fire House.	AG	120		
8083	W	G000000008		AG	250		
8103	W	G00000008	Instrumentation Facility.	AG	275		
8105	W	G000000008	Warehouse.	AG	1000		
8123	W	G000000008	SATCOM building.	AG	1000		
8133	W	G000000008	Main Gate Pass Office.	AG	250		
8164	W	G000000008	IDS.	AG	1000		
8185	S/W	G000000008	Navy Command and Control Systems	AG	6000		
8195	S/W	G000000008	Water pump station.	AG	500		
8270	W	G000000008	On left before pump station.	AG	2000		
Z8270	W	C000032070	Generator attaached to the above building.	AG	800		
8271	W	G000000008	On right before building 164.	AG	2000		
173	W	G000000008	Air Field Facility on Bronson Road.	AG	250		
253	W	G000000008	Weapons Compound beside building 17.	AG	250		
2117	W	G000000008	Metal building behind Pistol Range.	AG	550		
944	W	A000098635	Quarters A.	AG	275		
1435A	W	G000000008	Point Lookout.	UG	200		
1435B	W	G00000008	Point Lookout.	UG	500		
	hs or unless cal		be charged to building 1435.				

			THURSDAY		
BLDG	STATUS	JON	LOCATION	TYPE	CAPACITY
172	W	G000000008	Antenna building in woods behine quarters 478.	AG	500
461	S/W	G000000006	Officers Club.	UG	5000
478	W	A000098634	Public quarters, enlisted.	AG	275
663	W	G000000008	Golf Course Snack Bar.	AG	500
966	W	G000000008	Quarters X.		200
1362	W	G000000008	Behind Chesapeake Test Range.	AG	275
1392	W	G000000008	TC-7 Landing Aids building.	AG	500
1406A	W	G000000008	Chesapeake Test Range.	AG	4000
1409	W	G000000008	Missle build up building.	AG	1000
1670	W	G00000008	Lamps building behind Chesapeake Test Range.	AG	500
1693	W	G00000008	Golf Course Snack Bar.	AG	550
2053	W	G000000008	AIMD Jet Shop.	AG	275
2100	W	G000000008	EMP site behind quarters X.	AG	500
2118	W	G000000008	Behind Chesapeake Test Range.	AG	1000
2136	W	G000000008	Water pump station for building 1406.	AG	250
Z167	S/W	G000000010	Generator in woods behind quarters 478.	AG	500
Z1892	S/W	G000000010	Generator for building 1703.	AG	550

FRIDAY								
BLDG	STATUS	JON	LOCATION	TYPE	CAPACITY			
6010	6010 W A000100376		GSE Shop, Solomons.	AG	2000			
6014	W	A000100376	SEABEE Maintenance.	AG	1000			
6041	W	A000100376	Water pump station.	AG	550			
6429	W	A000100376	Sewage pump station nest to Q-B convault.	AG	500			
6082	W	A000100376	Hotel.	AG	1000			
6085	W	A000100376	Beside 6105.	AG	1000			
6086	W	A000100376	Target Support.	AG	5000			
6088	W	A000100376	GSE Shop, Solomons.	AG	500			
6103	W	A000100376	O.O.D. Office.	AG	1000			
6105	W	A000100376	Old Fire House (Contrator Office).	AG	1000			
6412	W	A000100376	Comfort station.	AG	500			
6432	W	A000100376	Sand blaster.	AG	500			
600A	W	A000098637	Quarters A, Solomons.	AG	500			
600B	W	A000098639	Quarters B, Solomons.	AG	550			
Z6126	W	A000100376	Generator, Main Gate.	AG	20			
Z6116	W	A000100376	Generator, Locked Compound.	AG	100			
6464	W	A000100376	SOL1B, Enter at storage tank (see NAVSEA).	AG	1000			
103	W	G000000007	Tower, Three times a week tank.	AG	1000			
117	W	G000000007	UFI.	AG	1000			
177	W	G00000007	AIMD Jet Shop.	AG	1000			
214	W	G000000008	Boathouse 2.	AG	550			
312	W		Boathouse 3.	AG	1000			
461	S/W		Officers Club.	UG	5000			
493	W		MWR.	AG	500			
606	W		Sheet Metal Shop behind PW building.	AG	300			
1406B	S/W	+	Chesapeake Test Range.	AG	500			
2109	W		A/C Combat behind Hangar 144.	AG	6000			
2100	**	000000000	740 Combat Borning Français 144.	710	0000			
					+			
					+			
-					+			
					+			
					1			

ON CALL									
BLDG	STATUS	JON	LOCATION	TYPE	CAPACITY				
162	S/W	G000000006	TC-7	S/W	15000				
454	S/W	G000000008	Generator buck-up for hot water, laundomat.	S/W	275				
1729	S/W	G000000007	Metal building across from FW in fenced compound.	S/W	275				
310Z	S/W	G000000011	Safety building, temporary use.	S/W	500				
401Z	S/W	G000000011	Religious Annex by Chapel, temporary use.	S/W	500				
409Z	S/W	G000000011	NAS Admin Boiler, temporary use.	S/W	1000				
Z105	S/W	G00000010	Radar by Gate #1.	S/W	275				
Z109	S/W	G000000010	Generator, old VQ-4 Hangar.	S/W	275				
Z118	S/W	G000000010	Emergency generator at Tower steps.	S/W	500				
Z147	S/W	G000000010	Emergency generator in front of Tower.	S/W	500				
Z148	S/W	G000000010	UHF/VHF Transmitter Site.	S/W	300				
Z155	S/W	G000000010	Air Field Lighting on road to VQ-4.	S/W	550				
Z167	S/W	G000000010	Generator in woods behind quarters 478. Both are sai	S/W	500				
Z178	S/W	G000000010	Past building 1410, left on gravel road, blue light.	S/W	300				
Z238	S/W	G000000010	Pumping station next to hangar 201.	S/W	20				
Z253	S/W	G000000010	Weapons Compound past building 1390.	S/W	100				
Z302	S/W	G000000010	Main Gate behine guard shack.	S/W	275				
Z390	S/W	G000000010	Air Field Lighting on Bronson Road.	S/W	500				
Z409	S/W	G000000010	Administrative building.	S/W	550				
Z420	S/W	G000000251	NAVAIR building by Swimming Pool (Old Logistics).	S/W	200				
Z426	S/W	G000000010	Communications building beside MOGAS.	S/W	250				
Z443	S/W	G000000010	Firehouse #1.	S/W	275				
Z461	S/W	G000000010	Officers Club generator.	S/W	275				
Z490	S/W	G000000010	CPD generator in fence behind 1490.	S/W	40				
Z505	S/W	G000000010	Generator beside Public Works.	S/W	150				
Z517	S/W	G000000010	Emergency generator, road side of hangar 111.	S/W	500				
Z524	S/W	G000000010	Water pump station across from station. Convault	S/W	250				
Z525	S/W	G000000010	Generator, water pump station.	S/W	1000				
Z526	S/W	G000000010	Water pump station nest to hangar 201.	S/W	550				
Z527	S/W	G000000010	Beside 177. In BLDG	S/W	275				
Z528	S/W		Generator, water pump station, Tate Road.	S/W	550				
Z576	S/W	G000000010	Generator, water pump station, side hangar 301.	S/W	20				
Z600	S/W		Generator, Sewage Station.	S/W	500				
2192A	S/W	1	Utility building at 2191.	S/W	4500				
Z1370	S/W	G000000010	Hospital generator.	S/W	500				
Z1370	S/W	G000000010	Emergency generator, Hospital.	S/W	550				
Z1390	S/W	G000000007	Emergency generator in Air Field actross from 173.	S/W	50				
Z1468	S/W	G000000010	Lift station generator on West Patrol Road.	S/W	150				
Z1598	S/W	G000000010	Outdoor Pool.	S/W	550				
Z1648	S/W	G000000010	Gen, sewage pump station on West Patrol Rd. Convault	S/W	250				
Z1703	S/W	G00000010		S/W	550				
Z1710	S/W	G00000010	Emergency generator, Tower.	S/W	500				
Z2065	S/W	G000000010	Generator beside LAMPS building.	S/W	20				
Z2036	S/W	G000000010	Water pump station nesxt to 1406.	S/W	150				
Z2144	S/W	G000000010	Emergency generator located off of Tippet Road.	S/W	275				
Z2145	S/W	G000000010	Emergency generator located off of Bay Forest Road.	S/W	275				

ON CALL (Continued)							
BLDG STATUS		JON	TYPE	CAPACITY			
Z2146 S/W G00000001		G000000010	Emergency generator located at Point Lookout.	S/W	275		
Z2147	S/W	G000000010	Emergency generator located off Point No Point.	S/W	275		
Z2173	S/W	G000000010	Emergency generator, Commissary Store.	S/W			
Z2185	S/W	G000000010	Emergency generator beside Force Warfare.	S/W	300		
Z2186	S/W	G000000010	Emergency generator beside building 104.	S/W	300		
Z2187	S/W	G000000010	Emergency generator beside Becker Building.	S/W	300		
Z2188	S/W	G000000010	Emergency generator inside Becker Building.	S/W	300		
Z2199	S/W	G000000010	VQ-4 generator.	S/W	500		
Z2272	S/W	G000000010	NAVAIR Crystal Place.	S/W	500		
Z2276	S/W	G000000010	Generator, water pump station.	S/W	500		
Z2385	S/W	G000000010	HAZMART	S/W	500		
Z2400	S/W	G000000251	Cinder block building (Pop Room) on Gold Coast by CTR	S/W	180		
Z2401	S/W	G000000251	Cinder block building near 528 pumphouse.	S/W	180		
Z3100	S/W	G000000007	National Weather Service AKA 2388.	S/W	500		
Z1490	S/W	G000000007	Emergency generator, IMD building (2)	S/W	700		
Z458	S/W	G000001696	Generator, Drill Hall, rack by ball field.	S/W	750		
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			DISRUPTIVE SERVICE		
BLDG	STATUS	JON	LOCATION	TYPE	CAPACITY
115	W	G000000006	Hangar 115 Convault	AG	12000
144	W	G000000006	Hangar 144	UG	12000
201	W	G000000006	Hangar 201 Convault	AG	8000
301	W	G000000006	AIMD Hangar	AG	6000
305	W	G000000006	Force Warfare	AG	6000
306	W	G000000006	VX-1	AG	6000
454	S/W	G000000008	Old Laundromat	AG	275
501	S/W	G000000006	Stream Power Only 3 Tanks	UG	20000
665	W	G000000006	Supply Warehouse	AG	3000
101A	S/W	G000000007	Hangar 101	AG	8000
109A	S/W	G000000007	Hangar 109	AG	8000
110A	S/W	G000000007	Hangar 110	AG	8000
111A	S/W	G000000007	Hangar 111	AG	8000
2191	S/W	R000000420	Building between Hush House and 144. Convault	AG	4000
310Z	S/W	G000000008	Safety building (Temporary use only)	AG	500
401Z	S/W	G000000008	Chaplain Annex	AG	500
406Z	S/W	G000000011	BOQ (Tempoary use only)	AG	275
409Z	S/W	G000000011	NAS Admin Boiler (Temporary use only)	AG	1000
416Z	S/W	G000000011	Temporary use only.	AG	0
419Z	S/W	G000000011	Temporary use only.	AG	0
420Z	S/W	G000000011	Temporary use only.	AG	0
423Z	S/W	G000000011	Building in front of Day Care Convault	AG	2000
439Z	S/W	G000000011	Temporary use only.	AG	0
441Z	S/W	G000000011	CPO Club Convault	AG	1000
446Z	S/W	G000000011	Temporary use only.	AG	0
458Z	S/W	G000000011	Temporary use only.	AG	0
460Z	S/W	G000000008	Four Seasons Store Boiler (Temporary use only)	AG	1000
464Z	S/W	G000000011	BEQ	AG	275
467Z	S/W	G000000011	Temporary use only. (Galley)	AG	0
469Z	S/W	G000000011	Temporary use only.	AG	275
501Z	S/W	G000000011	Back up for steam power, portable only.	Placed	
504Z	S/W	G000000011	Temporary use only.	AG	1000
585Z	S/W	G000000011	Back up for steam power for housing.		
586Z	S/W	G00000011	Schirra Circle, Back-up.	AG	0
Z505	S/W		Generator beside Public Works.	AG	150
1370Z	S/W	G000000011	Portable Boiler, Hospital.	AG	550
1451Z	S/W	G000000011	BEQ	AG	275
1452Z	S/W	G000000011	BEQ		
1453Z	S/W	G000000011	BEQ	AG	275
1454Z	S/W	G000000011	BEQ	AG	275
1455Z	S/W	G000000011	BEQ	AG	275
1597Z	S/W	G000000011	By NALC, back-up for steam power.	AG	550
2110Z	S/W	G000000011	ACLS building, Paxtuant River.	AG	275
2185Z	S/W	G000000011	Beside Force Warfare (Temorary use).	AG	300
2186Z	S/W	G000000011	Beside building 104 (Temporary use).	AG	300
2187Z	S/W	G000000011	Beside Robert Becker building (Temporary use).	AG	300
2188Z	S/W	G000000011	Robert Becker building (Tank inside, Temporary use).	AG	300
Z1490	S/W		Emergency generator, IMD building (2)	AG	700

EXHIBIT of Ground Fuel, MUP/JP5, Delivery Points and Schedule Naval Air Station Patuxent River

MONDAY, WEDNESDAY, and FRIDAY

BLDG/Hangar	Type Fuel	Location	Type Equipment
TPS, Hangar 110	MUP/JP5	Beside Hangar 111, end of Saufly Road	All gear and cans.
R/W Hangar 111	MUP/JP5	Beside Hangar 110, end of Saufly Road	All gear.
Bldg. 1405	MUP/JP5	End of Saufly Road before TPS ramp.	All gear.
V-22 Hangar 109	MUP/JP5	Old VQ-4 Hanger.	All gear.
Systems Hangar 144	JP5	New In-Flight Simulator	All gear.
S/A Hangar 115	MUP/JP5	Strike Hanger 115 only.	All gear and bowsers.
Golf Course	MUP	Beside 461, stay on pavement.	
Bldg. 604	MUP	Across from steam power.	Forklift.
Bldg. 665	MUP	Warehouses.	Forklift.
Hangar 301	MUP/JP5	AIMD GSE Shop.	All gear.
Bldg. 312	MUP	Boathouse #3.	Boats and cans
VX-1 Hangar 305	MUP/JP5	Beside F/W Taxiway AlphaWest.	All gear.
NRL ALSO Hangar 305	MUP/JP5	Same as above.	All gear.
F/W	MUP/JP5	Beside VX-1 Taxiway AlphaWest.	All gear.

TUESDAY

BLDG/Hangar	Type Fuel	Location	Type Equipment
TPS, Hangar 110	MUP/JP5	Beside Hangar 111, end of Saufly Road	All gear and cans.
R/W Hangar 111	MUP/JP5	Beside Hangar 110, end of Saufly Road	All gear.
Bldg. 1405	MUP/JP5	End of Saufly Road before TPS ramp.	All gear.
V-22 Hangar 109	MUP/JP5	Old VQ-4 Hanger.	All gear.
Systems Hangar 144	JP5	New In-Flight Simulator	All gear.
Bldg. 665	MUP	Warehouses.	Forklift.
Hangar 301	MUP/JP5	AIMD GSE Shop.	All gear.
VX-1 Hangar 305	MUP/JP5	Beside F/W Taxiway AlphaWest.	All gear.
NRL ALSO Hangar 305	MUP/JP5	Same as above.	All gear.
F/W	MUP/JP5	Beside VX-1 Taxiway AlphaWest.	All gear.

Note: During first round, check all bowsers and tanks. Thereaftercheck all yellow gear and mobile equipment.

ON CALL

BLDG/Hangar	Type Fuel	Location	Type Equipment
Bldg. 253	MUP/JP5	Weapons Compound on Bronson Road	Forklifts/Tow Tractor
Bldg. 214	MUP	Boat House #2 Strike Area	1000 Gallon Tank
Bldg. 312	MUP	Boat House #3 Buse Road	Boats/cans/transient boats.
Bldg. 1485	MUP	Special Trails Unit	Tugs/Forklifts
TC-7	MUP/JP5	Steam Cat	Tugs/Forklifts
VQ-4	MUP/JP5	Buse Road to Buck Road, across from L	Tugs/Forklifts/Light Carts
Hangar 2133	MUP/JP5	E&F Test Facility	Bowsers/Tugs/etc.
Bldg. 307	MUP/JP5	AIMD Tire Shop	All gear
Bldg. 177	MUP/JP5	AIMD Jet Repair	All gear
Bldg. 104	MUP	Beside UFI Shop	Forklifts/Tow Tractor
Hangar 101	MUP/JP5	Range Directorate	Tugs
Bldg. 515	MUP	ServMart	Forklift
NICE East	MUP	St. Inagoes Annex	2000 Gallon Tank
Solomons	MUP	Solomons Annex	1500 Gallon Tank
Bldg. 126	MUP	Solomons Annex	Generator
Bldg 173	MUP	Air Field Facility	Arresting Gear

Note: All cans may be fueled when doing rounds if time permits.

Exhibit of Refueling Services for FY04 Naval Air Station Patuxent River

Month	TrkWkdys	PitWkdys	TrkWknds	PitWknds	TotalTrk	TotalPit	Total
Oct-03	1869	0	101	0	1970	0	1970
Nov-03	1293	0	157	0	1450	0	1450
Dec-03	1446	0	99	0	1545	0	1545
Jan-04	1314	0	125	0	1439	0	1439
Feb-04	1535	0	119	0	1654	0	1654
Mar-04	1759	0	82	0	1841	0	1841
Apr-04	1815	0	103	0	1918	0	1918
May-04	1560	0	108	0	1668	0	1668
Jun-04	1625	0	130	0	1755	0	1755
Jul-04	1391	0	99	0	1490	0	1490
Aug-04	0	0	0	0	0	0	0
Sep-04	0	0	0	0	0	0	0
Year Total	15607	0	1123	0	16730	0	16730

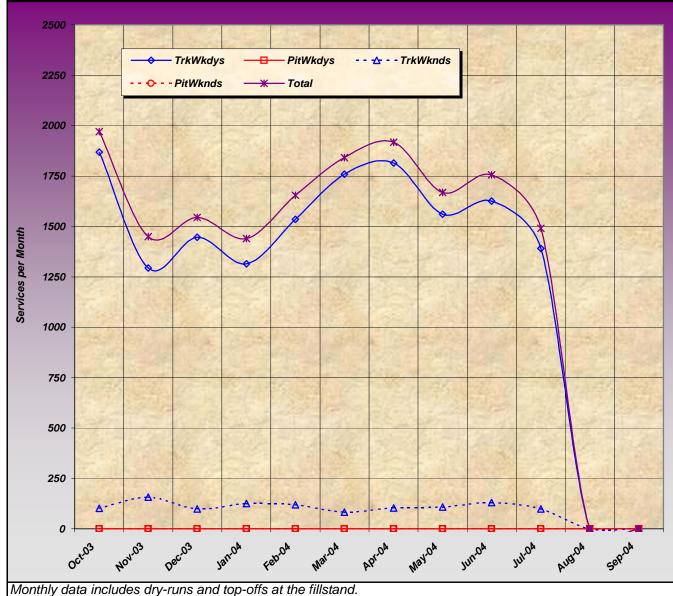


Exhibit of Truck (Cold Refueling) Services for FY04 Naval Air Station Patuxent River

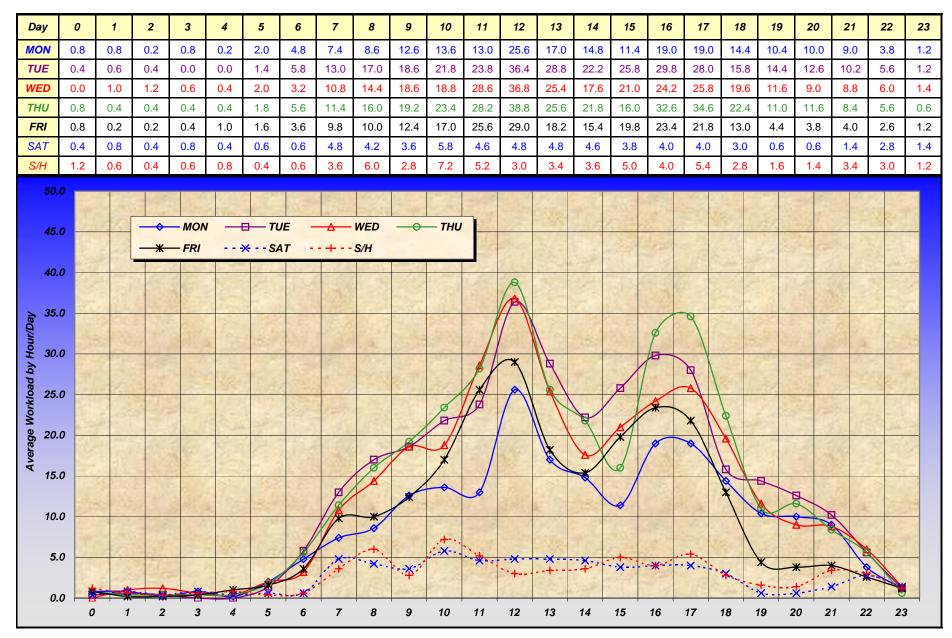


Exhibit of Pit (Cold Refueling) Services for FY04 Naval Air Station Patuxent River

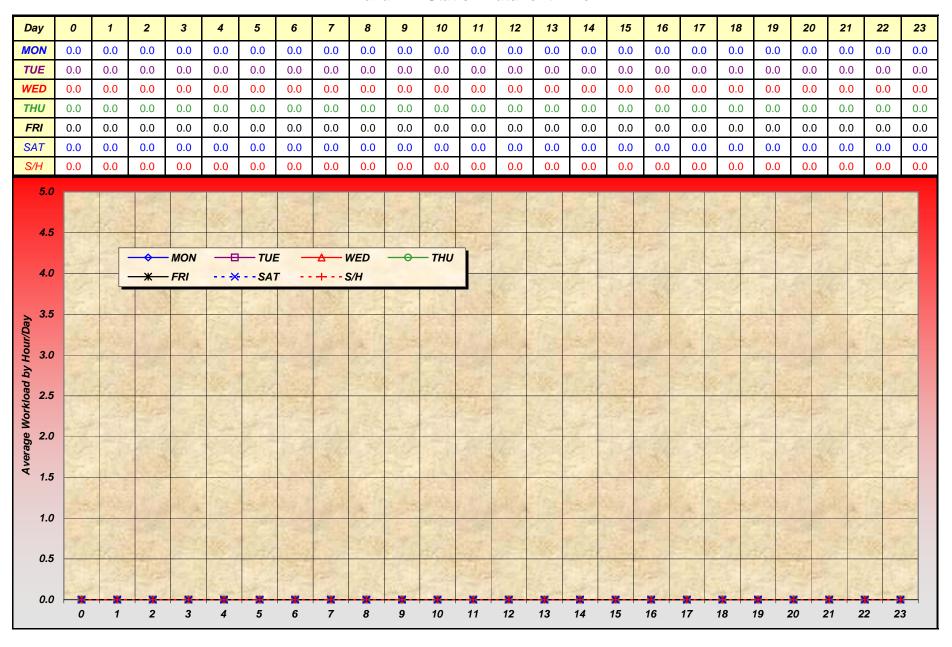


Exhibit of All Refueling Services for FY04 Naval Air Station Patuxent River

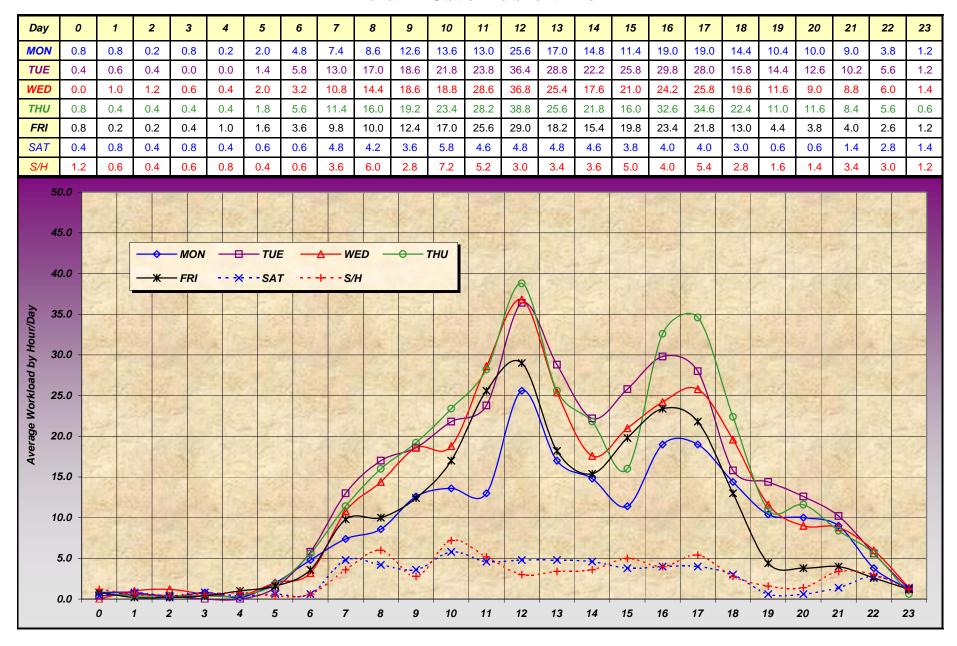


Exhibit of Cryogenics (Liquid Oxygen) Operations, FY04-07 Naval Air Station Patuxent River

Nov-03 3712 1 3065 63 8 Dec-03 3691 1 3305 69 34 Jan-04 3588 1 3844 61 13 Feb-04 3723 1 2833 59 28 Mar-04 6877 2 3587 76 19 Apr-04 3523 1 3300 72 7		Receipts		Total Gallons Issued to:						
Nov-03	Month	Gallons	#	Gallons	# Tanks	# Carts	# Converters	# Medical	# Other	# Cylinders
Nov-03	Oct-03	3251	1	4110		86				44
Jan-04 3688 1 3844 61 13 14 13 15 15 14 15 15 15 15 15	Nov-03	3712	1	3065		63				8
Jan-04 3688 1 3844 61 13 14 13 15 15 14 15 15 15 15 15	Dec-03	3691	1	3305		69				34
Feb-04 3723 1 2833 59 19 19 19 19 19 19 19			1	3844		61				13
Mar-04	Feb-04	3723	1	2833		59				28
Agr-04 3523 1 3300 72										
May-04 3500 1 3225 66 67 27 27 36 36 37 370 1 3796 67 7 27 370 1 3796 67 7 27 38 36 37 37 38 4 76 7 38 38 38 38 38 38 38										7
Jun-04 3700 1 3796 87 27 Jul-04 3567 1 3614 76			1							36
Jul-04 3567 1 3614 76 13 Aug-04						87				
Aug-04										
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Oct-04										
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Exhibit of Cryogenics (Liquid Nitrogen) Operations, FY04-07 Naval Air Station Patuxent River

	Receipts		ipts Total Gallons Issued to:							
Month	Gallons	#	Gallons	# Tanks	# Carts	# Converters	# Medical	# Other	# Cylinders	
Oct-03	3850	1	1493	19	40		1		66	
Nov-03	3850	1	942	5	30		0		24	
Dec-03	3850	1	1025	14	28		1		67	
Jan-04	3702	1	874	12	22		0		28	
Feb-04	0	0	901	11	27		1		56	
Mar-04	3850	•	1383	24	34		2		51	
Apr-04	3300		908	22	28		1		33	
May-04	3850		488	9	5		2		44	
Jun-04	3850		1140	10	27		2		35	
Jul-04	7316	•		6	22		4		35	
Aug-04										
Sep-04										
Oct-04										
Nov-04										
Dec-04										
Jan-05										
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Sep-07										
Average	3742	1	994	13	26	0	1	0	44	
The symbol #	indicates the	"numbe	er of" receipt ar	nd various types	s of issue opera	ntions.				